# The RED BOOK PHYSICAL THERAPY APPLIANCES



GENERAL & ELECTRIC X-RAY CORPORATION

Formerly Victor X-Ray Corporation

## EQUIPMENT

AND ACCESSORIES

for

## PHYSICAL THERAPY

High Frequency—Diathermy Accessories Galvanic and Sinusoidal Accessories Quartz Lamp Accessories • Thermospectral Lamps • Treatment Tables • Hydrotherapy Equipment • Vibrators • Muscle Training Apparatus • Bakers • Heat Pads

#### SPECIAL PRODUCTS

Eye Magnets · Centrifuges · Claritors Color Photography · Cauteries Electrocardiography

SUPPLY DEPARTMENT

# GENERAL ELECTRIC X-RAY CORPORATION

Formerly Victor X-Ray Corporation

Manufacturers of the Coolidge Tube and complete line of X-Ray Apparatus Physical Therapy Apparatus, Electrocardiographs, and other Specialties 2012 Jackson Boulevard Branches in all Principal Cities Chicago, Ill., U.S.A.

730-D

Since 1895 the Hallmark of Quality on



X-Ray and Physical Therapy Apparatus



# Foreword\_

VICTOR'S rich heritage in the art of electro-medical equipment construction dates back more than three decades. After so many years of service the Victor Trademark has come to mean both intelligent workmanship and consistent quality.

It has always been our policy to put out only such equipment as we know to be best suited to the purpose for which you purchased it. This policy applies whether the item in question is an electrode or an ultraviolet lamp. All illustrations, descriptions and recommendations outlined in this bulletin represent in our estimation the best equipment. It is possible, of course, that between the time this bulletin is issued and a new one is put out, certain improvements may be made in the items listed. It is our practice to supply you the more modern equipment with the understanding that it may be returned if it does not meet with your approval.



#### **IMPORTANT**

All prices are F.O.B. U.S.A. and are subject to change without notice



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- G—All items so marked are particularly designed for use with either low frequency or galvanic currents, as indicated in the description of the part.

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## Victor Vario-Frequency Diathermy Apparatus

A Two-Section Mobile Apparatus for the Complete Range of High Frequency Therapy



Whether it be the smallest extremity, or the chest, or even the entire body, this machine provides a means for producing within the tissues, heat with its analgesic, chemical, bactericidal, metabolic and physiological qualities.

The smooth readily controllable flow of power either in coagulating quantity or in milder doses adequately, efficiently and safely applied with Victor accessories is characterized by freedom from sensory effects other than a satisfying warmth and by a pleasantness not obtained with less perfect apparatus.

The heating is not due to any thermal conduction, radiation or convection from the electrodes but is generated within and at the surface of the body through the conversion of electrical into thermal energy which takes place as the high frequency current passes through the tissues.

Reference: The statements made as to the therapeutic value of diathermy currents are based on the accepted Medical literature of the day. Reprints or references covering any point will be furnished on request.

Send for bulletin on the Vario-Frequency Diathermy Apparatus.

## Suggested Accessories for Use With Diathermy Apparatus

#### FOR THE EAR, NOSE AND THROAT SPECIALIST

1—J6184 Binaural Diathermy Electrode 1-A3423 Sand Bag Set 1—J5377 Dispersive Electrode, 4x 6" 1-J6180 Rubber Bandage 1—[5379 Dispersive Electrode, 6x 8" 1-J6152 Ace Bandage 1—J5597 Dispersive Electrode, 10x12" 1-16148 Electrode Compound 1—A3131 Electrode Foil, 10 lbs. 1-J6188 Severus Tonsil Snare Electrode 1-J6230 Electrode Tissue 1-16082 Bifurcated Cord 2—J6033 Electrode Clip Connectors 1-J6097 Multiple Connector, insulated 1-J6183 Flexible Connector for Elec-1-A3096 Victor Interval Timer trode Foil 1-J6204 Putman Sand Bag

Price, Complete, \$59.35

#### FOR THE DERMATOLOGIST

1—J5377 Dispersive Electrode, 4x 6" 1-J6152 Ace Bandage 1-15379 Dispersive Electrode, 6x 8" 1-16148 Electrode Compound 1-J5597 Dispersive Electrode, 10x12" 1—J6057 Electro-Coagulation Electrode 1-A3131 Electrode Foil, 10 lbs. 1-J5977 Surgical Diathermy Electrodes 1-16230 Electrode Tissue 1-16165 Electro-Coagulation Electrode 2—J6033 Electrode Clip Connectors 1-J6082 Bifurcated Cord 1-16183 Flexible Connector for Elec-1-J6097 Multiple Connector, insulated trode Foil 1-V2915 High Frequency Foot Switch 1-A3423 Sand Bag Set 1-A3096 Interval Timer 1-A6180 Rubber Bandage

Price, Complete, \$111.35

#### FOR THE G-U SPECIALIST

1—J5377 Dispersive Electrode, 4x 6"	1—J6171 Cherry Vaginal Electrode
1—J5379 Dispersive Electrode, 6x 8"	1-J6195 Victor-Chapman Vaginal Elec-
1—J5597 Dispersive Electrode, 10x12"	trode
1—A3131 Electrode Foil, 10 lbs.	1—J6239 Diathermy Prostatic Electrode
1—J6230 Electrode Tissue	1—J6049 Willmoth Prostatic Electrode
2—J6033 Electrode Clip Connectors	1—J6050 Corbus Scrotal Electrode
1—J6183 Flexible Connector for Elec-	1—16070 Rectal Electrodes
trode Foil	1—I6065 Bladder Fulguration Electrode
1—A3423 Sand Bag Set	1—16082 Bifurcated Cord
1—J6180 Rubber Bandage	1—16097 Multiple Connector, insulated
1—J6152 Ace Bandage	
1—16148 Electrode Compound	1—V2915 High Frequency Foot Switch
1-16140 Corbus Cervical and Urethral	1—A3096 Interval Timer
Electrode	1—J6203 Uterine Set
1—I6064 Bath Speculum	

Price, Complete, \$163.85

# Suggested Accessories for Use With Diathermy Apparatus

#### FOR THE EAR, NOSE AND THROAT SPECIALIST

1—J6184 Binaural Diathermy Electrode 1—J5377 Dispersive Electrode, 4x 6" 1—J5379 Dispersive Electrode, 6x 8" 1—J5597 Dispersive Electrode, 10x12" 1—A3131 Electrode Foil, 10 lbs. 1—J6230 Electrode Tissue 2—J6033 Electrode Clip Connectors 1—J6183 Flexible Connector for Elec-	1—A3423 Sand Bag Set 1—J6180 Rubber Bandage 1—J6152 Ace Bandage 1—J6148 Electrode Compound 1—J6188 Severus Tonsil Snare Electrode 1—J6082 Bifurcated Cord 1—J6097 Multiple Connector, insulated
2—J6033 Electrode Clip Connectors  1—J6183 Flexible Connector for Electrode Foil  1—l6204 Putman Sand Bag	

Price, Complete, \$59.35

#### FOR THE DERMATOLOGIST

1—J5377 Dispersive Electrode, 4x 6"	1—J6152 Ace Bandage
1—J5379 Dispersive Electrode, 6x 8"	1—J6148 Electrode Compound
1—J5597 Dispersive Electrode, 10x12"	1—J6057 Electro-Coagulation Electrode
1—A3131 Electrode Foil, 10 lbs.	1—J5977 Surgical Diathermy Electrodes
1—J6230 Electrode Tissue	1—J6165 Electro-Coagulation Electrode
2—J6033 Electrode Clip Connectors	1—J6082 Bifurcated Cord
1—J6183 Flexible Connector for Elec-	1—J6097 Multiple Connector, insulated
trode Foil	1—V2915 High Frequency Foot Switch
1—A3423 Sand Bag Set	1—A3096 Interval Timer
1—A6180 Rubber Bandage	

Price, Complete, \$111.35

#### FOR THE G-U SPECIALIST

1—J5377 Dispersive Electrode, 4x 6"	1—J6171 Cherry Vaginal Electrode
1—J5379 Dispersive Electrode, 6x 8"	1-J6195 Victor-Chapman Vaginal Elec-
1—J5597 Dispersive Electrode, 10x12"	trode
1—A3131 Electrode Foil, 10 lbs.	1—J6239 Diathermy Prostatic Electrode
1—J6230 Electrode Tissue	1—J6049 Willmoth Prostatic Electrode
2—J6033 Electrode Clip Connectors	1—J6050 Corbus Scrotal Electrode
1—J6183 Flexible Connector for Elec-	1—J6070 Rectal Electrodes
trode Foil	1-16065 Bladder Fulguration Electrode
1—A3423 Sand Bag Set	1-16082 Bifurcated Cord
1—J6180 Rubber Bandage	1—16097 Multiple Connector, insulated
1—J6152 Ace Bandage	
1—I6148 Electrode Compound	1—V2915 High Frequency Foot Switch
1-J6140 Corbus Cervical and Urethral	1—A3096 Interval Timer
Electrode	1—J6203 Uterine Set
1—J6064 Bath Speculum	
	1 / 0100 05

Price, Complete, \$163.85

#### HIGH FREQUENCY (DIATHERMY)

#### FOR THE GYNECOLOGIST

1—J5377 Dispersive Electrode, 4x 6"	1-J6171 Cherry Vaginal Electrode
1—[5379 Dispersive Electrode, 6x 8"	1—J6195 Chapman Vaginal Electrode
1—J5597 Dispersive Electrode, 10x12"	1—J6203 Uterine Set
1—A3131 Electrode Foil, 10 lbs.	1—]6099 Willmoth Uterine Electrodes
1—J6230 Electrode Tissue	1—J6065 Bladder Fulguration Electrode
2—J6033 Electrode Clip Connectors	1—J5126 Duplex Autocondensation Couch
1—J6183 Flexible Connector for Elec-	Cushion
trode Foil	1—J6187 Abdominal Autocondensation
1—A3423 Sand Bag Set	Electrode Attachment
1—J6180 Rubber Bandage	1—J5104 Autocondensation Handle Elec-
1—J6152 Ace Bandage	trode
1—J6148 Electrode Compound	1—J6082 Bifurcated Cord
1—J6140 Corbus Cervical and Urethral	1—J6097 Multiple Connector, insulated
Electrode	1—A3096 Interval Timer
1—J6064 Bath Speculum	

Price, Complete, \$164.00

#### FOR THE HOSPITAL

1—J6184 Binaural Diathermy Electrode	1-16140	Corbus Cervical and Urethral
1—J6191 Spring Cuff Electrode	-	Electrode
1—J5945 Universal Diathermy Clamp	1-16064	Bath Speculum
1—J6095 Army Disc Electrode		Victor-Chapman Vaginal Elec-
1—J6071 Spongio-Pilene Disc Electrode		trode
with Stud 1" diameter	1-16239	Diathermy Prostatic Electrode
1—J6072 Spongio-Pilene Disc Electrode	1-16050	Corbus Scrotal Thermophore
with Stud 11/2" diameter		Rectal Electrodes
1—J5709 Spongio-Pilene Disc Electrode	1-16057	Complete Set of Needles with
with Stud 2" diameter		Handle
1—J5551 Universal Handle	1-15977	Surgical Diathermy Electrodes
1—J5377 Dispersive Electrode, 4x 6"		Uterine Set
1—J5379 Dispersive Electrode, 6x 8"		Bladder Fulguration Electrode
1—]5597 Dispersive Electrode, 10x12"		Duplex Autocondensation Couch
1—A3131 Electrode Foil, 10 lbs.		Cushion
1—J6230 Electrode Tissue	1-16187	Abdominal Autocondensation
2—]6033 Electrode Clip Connectors		Electrode Attachment
1—J6183 Flexible Connector for Elec-	1-15104	Autocondensation Handle Elec-
trode Foil		trode
1—A3423 Sand Bag Set	1-16082	Bifurcated Cord
1—J6076 Binding Strap	1—]6097	Multiple Connector, insulated
1—J6180 Rubber Bandage	1-V2915	High Frequency Foot Switch
1—J6152 Ace Bandage	1-A3096	Interval Timer
1—A3407 Compression Bladder		
1—J6148 Electrode Compound		
Duine Complet	to 6272 05	

Price, Complete, \$273.05

#### FOR THE SURGEON

FOR THE SURGEON				
1—[6191 Spring Cuff Electrode	1—J6076 Binding Strap			
1—15945 Universal Diathermy Clamp	1—J6180 Rubber Bandage			
1—16095 Army Disc Electrode	1—J6152 Ace Bandage			
1—J6071 Spongio-Pilene Disc Electrode	1—A3407 Compression Bladder			
with Stud 1" diameter	1—J6148 Electrode Compound			
1—J6072 Spongio-Pilene Disc Electrode	1—J6057 Complete Set of Needles with			
with Stud 1½" diameter	handle			
1—15709 Spongio-Pilene Disc Electrode	1—[5977 Surgical Diathermy Electrodes			
with Stud 2" diameter	1—16099 Willmoth Uterine Diathermy			
1—J5551 Universal Handle	Electrodes			
1—J5377 Dispersive Electrode, 4x 6"	1—J6165 Electro-Coagulation Electrode			
1—[5379 Dispersive Electrode, 6x 8"	1—I6203 Uterine Set			
1—J5597 Dispersive Electrode, 10x12"	1-16065 Bladder Fulguration Electrode			
1—A3131 Electrode Foil, 10 lbs.	1—J6082 Bifurcated Cord			
1—I6230 Electrode Tissue	1—16097 Multiple Connector, insulated			
2—J6033 Electrode Clip Connector	1—V2915 High Frequency Foot Switch			
1—J6183 Flexible Connector for Elec-	1—A3096 Interval Timer			
trode Foil	1—I6235 Hemorrhoid Clamp			
1—A3423 Sand Bag Set				
D	1 0107 15			

Price, Complete, \$197.15

#### Surgical Diathermy Electrodes



These instruments are designed for the electro - coagulative method of removing pathological growths. Victor Surgical Diathermy Electrodes are made of a hard alloy, heavily plated and equipped with threaded connections for attachment to the insulated handles, J5961 and J5962. The entire set comes in a plush lined case and includes a J5975 attachment cord. In addition to the straight needle the set comprises ball

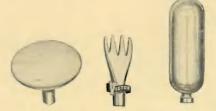
electrodes of various sizes which have been used for coagulation of the base of tumors after removal, for the destruction of growths and for cavity work; disc types in the destruction of growths and flat electrodes in the ablation of tumors.

Turrell in his book, says,

"The surgical application of diathermy is useful in a variety of conditions."

Cat. No. J5977	Complete Set of Surgical Diathermy Electrodes, Handles, Attach-	
	ment Cord and Case	30.00
Cat. No. 15961	Curved Handle	7.25
Cat. No. 15962	Straight Handle	6.75
Cat. No. 15963	Straight Needle Electrode	1.50
Cat. No. 15964	Straight Flat Electrode	1.50
Cat. No. 15965	Curved Flat Electrode	1.50
Cat. No. 15966	352" Ball Electrode	.85
Cat. No. 15967	<sup>3</sup> Ball Electrode	.85
Cat. No. 15968	1/4" Ball Electrode	.85
Cat. No. 15969	1/4" Disc Electrode	.85
Cat. No. 15970	3/8" Disc Electrode	.85
Cat. No. 15971	½" Disc Electrode	.85
Cat. No. 15972	5/8" Disc Electrode	.85
Cat. No. J5973	3/4" Disc Electrode	.85
Cat. No. 15974	1" Disc Electrode	.85
Cat. No. J5975	Attachment Cord for Surgical Diathermy Set	3.50

#### Willmoth Uterine Diathermy Electrodes



This cut illustrates the Willmoth set of three Surgical Diathermy Electrodes for the electro-coagulation of uterine cases as described in the Kentucky Medical Journal issue of October, 1924, "Electro-Coagulation Versus Operation in Cancer of the Uterus."

The handle used is our J5961 (curved) or J5962 (straight) such as we supply with J5977 set of Surgical Diathermy Electrodes.

Cat. No. J6099 Willmoth set of 3 Surgical Diathermy Electrodes without handle.....\$10.00

#### Electro-Coagulation Handle



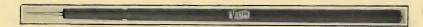
A heavily insulated handle for use with electro-coagulation needles. This handle is equipped to connect with Victor attachment cord [5975.

Cat. No. J6056 Insulated Handle for Electro-Coagulation Needles....

\$5.00

#### Electro-Coagulation Electrode

Magazine Type (Insulated)

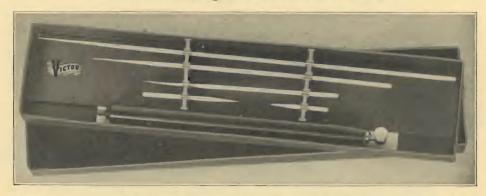


The handle is hollow and contains a single 3" aluminum needle which is securely held by a chuck. One advantage of this design is that the operator may expose only so much of the needle as he wishes to use; the balance being insulated by its position in the handle.

This handle has no exposed metal parts, the connecting cord (with friction grip terminal) being attached to an adjustable insulated holder at the top.

Cat. No. J6165 Electro-Coagulation Electrode with Handle-Magazine Type......\$10.00

#### Electro-Coagulation Electrodes

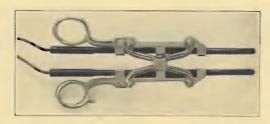


This set consists of five needles made of a special aluminum alloy. These needles are used after the method in vogue for electro-coagulation or electro-desiccation surgery. The handle has a threaded stem to fit the connecting cord J 5975.

Electro-coagulative destruction of tissue should not be confused with its destruction by cautery. In the former, tissues are coagulated but not burnt as in cautery and there is in this difference the basis for numerous important advantages in electro-coagulation as compared to the cautery method. The heat originates in the tissue in electro-coagulation and is not conveyed to the tissue by conduction.

Cat.	No.	16051	Needle, 11/2"	)
Cat.	No.	J6052	Needle, $2\sqrt{2}$ "	)
Cat.	No.	J6053	Needle, 5"	)
Cat.	No.	J6054	Needle, 8"	)
Cat.	No.	J6055	Needle, 11"75	5
Cat.	No.	J6057	Complete Set of above Needles with Handle 7.75	5

#### Hemorrhoid Clamp

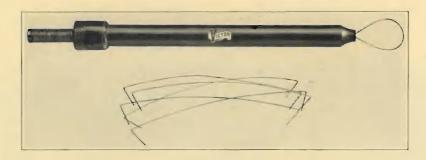


Users of this instrument claim it to be quite effective in the removal of small hemorrhoids.

The clamp, designed by Dr. Bierman, destroys the hemorrhoids by the electrocoagulative method. The metal-faced jaws are connected to the two terminals of the high frequency machine by means of the usual friction grip terminals.

Cat. No. J6235 Hemorrhoid Clamp \$35.00

#### Severus Tonsil Snare Electrode





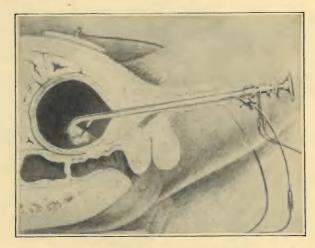
An insulated snare equipped with connections for High Frequency Apparatus. It serves the dual purpose of removing diseased tissue by the usual snare method while, at the same time, it applies the electrical energy to coagulate tissues progressively with the closing of the snare loop.

The usual Vedder loops are used. The snaring action is of the slow progressive type. Other types of tonsil electrodes furnished on order.

Cat. No. J6188 Severus Tonsil Snare Electrode.......\$

#### Bladder Fulguration Electrode





Growth being treated by diathermy through a cystoscope.

This electrode is introduced through the channel of an irrigating cystoscope. It is made of wire, covered, except at the tip, by an insulating waterproof material. The acorn shaped tip is of metal and corresponds to size 6 French Scale. The instrument takes the ordinary friction grip terminal. With the tip in contact with the growth, the current passing through the growth generates a coagulating heat.

"Diathermy admits of the destruction of villous tumors of the bladder per urethram. Most urinary surgeons have adopted this method for the destruction of these tumors, and it is regarded by many as the only justifiable procedure." Turrell: Principles of Electro Therapy.

Cat. No. J6065 Flexible Electrode for Bladder Fulguration.....

...\$4.50

#### Cervical and Urethral Electrode



Figure A

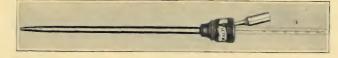


Figure B

Corbus and O'Conor in their book report favorably on the use of this type electrode in the treatment of certain diseases of the female urethra and cervix and the urethra of the male. The efficacy being most generally attributed to the introduction of heat into the body through the passage of high frequency current and more specifically the destructive effects on the gonococcus of temperatures somewhat above normal body temperature.

The fluted metal tube may be used with either of the two insulating sheaths—the one shown in Figure "A" is intended for female urethral and cervical application, while the other, Figure "B", is for male urethral cases. The thermometer which is inserted to the full depth of the metal tube is sufficiently long



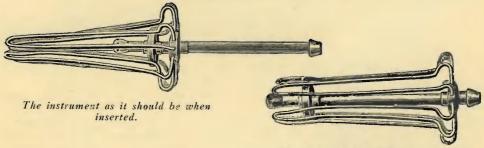
#### Method of applying diathermy in gonorrheal endocervicitis.

By means of the diathermy current the heat is passed between the two electrodes, the active electrode being the smaller localizes the heat directly around it. The thermometer that passes into the core of the instrument registers approximately the degree of heat in the tissues immediately surrounding the electrode. (From Diathermy in the Treatment of Genito-Urinary Diseases, by Corbus and O'Conor; Bruce Pub. Co.)

to permit temperature observations while the thermometer is in place. The terminal receptacle takes the standard friction grip terminal.

ment) 4.00

#### Bath Speculum



The instrument with plunger pushed forward for dilatation.

A wire douche speculum with extension fitting providing for proper dilatation. With the plunger forward after insertion, the maximum effect of the hot sitz bath is obtained.

Cat. No. 16064 Wire Bath Speculum...

.\$1.25

#### Prostatic Electrode Willmoth Type



This is a modification by Willmoth of the conventional Prostatic Electrode. Replying to a query by a correspondent, the American Medical Association Journal, October 10, 1925, page 1155, states,

"Diathermy furnishes excellent results in cases of chronic prostatitis."

Corbus & O'Conor in their book emphasize the necessity of obtaining a complete history and concluding an absolute diagnosis and then say in part:

"From our clinical experience we believe that heat, as applied by medical diathermy, will destroy the gonococcus and when it is localized, as in gonorrheal prostaticis, prostatic abscess and seminal vesiculitis, its therapeutic possibilities are absolutely specific."

The metal part is made of aluminum and is mounted in a shank of insulating material. The end of the handle contains a receptacle which takes the regular friction grip cord terminal.

Cat. No. J6049 Prostatic Electrode ...

\$12.00

#### Waddington Prostatic Electrode



To quote Dr. Waddington:

"The Waddington prostatic electrode is a conspicuously differing modification of the many prostatic electrodes previously available. The perineal curve enables a treatment to be given in the sitting position if so desired and is an invaluable feature when using the Morton wave or static condenser discharge.

"With diathermy treatments in the usual reclining posture, this curve enables the electrode to be more conveniently retained in place with a sand bag, and the patient is able to move and change position to a certain extent without danger of irritating a sensitive prostate through sudden and painful pressure exerted by means of an inconveniently protruding electrode handle.

"The active or metal portion is long enough to adequately direct the current through the prostate and the seminal vesicles. The curve is so built as to more easily follow an irregular contour and will automatically contact with a greater portion of the gland than is possible with a straight or spoon shaped adaptation.

"The extreme tip of the electrode is expansively blunted for easy insertion through the sphincters and thereby obviates any dangerous concentration of current against the usually contacting delicate but insensitive rectal membrane.

"The electrode is not only admirably adapted for diathermy applications, but may also be utilized for the treatment of dysmenorrhoea and other gynecological conditions indicating diathermy, and where the rectal route offers a convenient, satisfactory, and more direct approach than the vaginal canal.

"Subinvoluted uterus and various other conditions affecting the genitourinary organs for which contractile currents, static, and the various sinusoidal and wave currents, may be valuably indicated, are more conveniently and adequately treated by means of this prostatic electrode than by any antero-posterior arrangement of external pads or by a vaginal electrode, which latter can only contact with an exceedingly circumscribed por-

#### HIGH FREQUENCY (DIATHERMY)

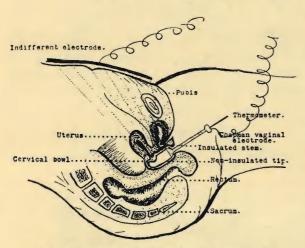
tion of the uterus in contrast with the full length application provided by the rectal route.

"Being made of aluminum, this electrode can be utilized even with the D. C. sinusoidal and wave currents as, in the mild current dosage invariably indicated in such conditions, there is no danger of this negligibly ionizable metal causing electrolysis."

The latest edition of "Practical Index to Electro and Photo Therapy", by Dr. Waddington, gives details in all indicated techniques.

Cat. No. J6239 Waddington Prostatic Electrode

#### Victor-Chapman Vaginal Electrode



Cross section of female pelvis showing Chapman vaginal electrode in position (Diathermy in Gynecology, W. B. Chapman, M. D., Chicago; Am. Jour. Phys. Therapy, May, 1927.)

"On account of its analgesic property, diathermy is indicated in painful menstruation. On account of its vasomotor effects, it is indicated in amenorrhoea. Its greatest value, however, lies in the treatment of inflammations in which it has a specific action upon the infective agent as well as in producing the general beneficial effects already mentioned. Bacteria are either killed or attenuated in virulence and growth according to their ability to resist high temperatures."—"Diathermy in Gynecology," by W. B. Chapman, M. D., May, 1927 issue American Journal of Physical Therapy.

\$9.50

The electrode is rotated at an angle of 90° from the horizontal plane for insertion. As soon as the body of the electrode passes the external

vaginal orifice, it virtually snaps into position. After introduction it is pushed to the extreme posterior fornix of the vagina and then rotated to the horizontal position. When this is done, the cervix uteri is automatically engaged within the cervical bowl and is held there, while the anterior lip of the cervical bowl enters the posterior fourchette so that there is no portion of the field that is not covered by the current. The inactive electrode is usually applied over the lower abdomen, midway between the anterior superior iliac spines with its lower edge about 2" above the symphysis pubis. The pubis should be shaved in order to obtain the best possible electrical contact.



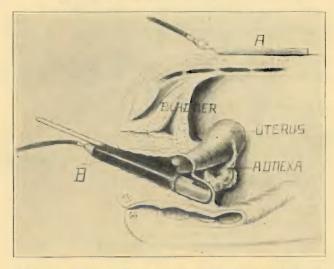
This is undoubtedly one of the best electrodes available for the treatment of general pelvic infections.

The staff is insulated and has a fitting to take cord J6082 and others with friction grip terminals.

Cat. No. J6195 Victor-Chapman Vaginal Electrode with Thermometer \$12.00 Cat. No. J6196 Victor-Chapman Vaginal Electrode less Thermometer 8.00

#### Cherry Vaginal Electrode

Designed by Dr. Thomas H. Cherry of New York.



Abdominovaginal application of electrode: A, abdominal electrode; B, Cherry electrode with thermometer giving temperature of vaginal vault. The temperature of the adnexa is perhaps slightly greater than the vaginal temperature.

#### References:

"DIATHERMY IN PELVIC INFECTIONS" in July 15, 1925, issue of Medical Journal and Record.

"THE RESULTS OF DIATHERMY IN PELVIC INFECTIONS" in June 5, 1926 issue of Journal A. M. A.

Quoting from the last named article, Dr. Cherry says:

"I would venture to assert that diathermy is probably the most satisfactory available agent for the conservative treatment of pelvic infections due to the gonococcus. It relieves pain, diminishes the pelvic masses, and aids in complete resolution. Used as a preoperative therapeutic measure, it will eliminate many of the technical difficulties in the removal of large pelvic masses, and thereby contributes to a smoother convalescence. Incidentally, the percentage of postoperative wound infections is lessened."

Diathermy treatments using the Corbus Electrode (J6140) were also given cases having a coexisting endocervicitis and urethritis.



The Cherry Electrode is provided with an interior groove situated just below the surface, intended to admit a thermometer. The thermometer is in actual contact with the tissues, thereby increasing the accuracy and reducing the time lag of the temperature readings.

A soft rubber insulating sheath is supplied with this electrode.

Cat. No. J6171 Cherry Vaginal Electrode with Thermometer.........\$12.50

#### Uterine Set



A combination electrode, designed by Dr. W. J. Tyndall,

for the application of either diathermy, galvanic or sinusoidal currents to the uterus, the cervical canal and the external os in the same application.

The instrument consists of a well insulated staff with copper cup to which may be attached any of the six assorted bougies which are a part of the set. Receptacle in the end of the staff takes the usual friction grip cord terminal.



Cat. No. J6203 Victor Uterine Set, complete.....

.\$12.00

#### Rectal Electrodes



The set consists of four aluminum electrodes arranged with suitable receptacles to accept the friction grip cord terminals.

In the treatment of anal fissure, electrodes of this type are used in relieving spasm of the sphincter.

Cat.	No. J6070	One set (four) Victor Rectal Thermophores	\$12.50
Cat.	No. J6084	Victor Rectal Thermophore (small)	4.00
Cat.	No. J6085	Victor Rectal Thermophore (medium)	4.00
Cat.	No. J6086	Victor Rectal Thermophore (large)	4.00
Cat.	No. J6087	Victor Rectal Thermophore (extra large)	4.00

#### **NEW PRODUCTS**

Fever Electrodes	-	-	-	-	- (I	nform	ation	on re	Page quest)
Claritors -	-	-	-	-	-	-	-	-	108
Color Photography	-	-	-	-	-	-	-	-	109
Electrocardiography		-	-	-	-	-	-	-	110

#### Corbus Scrotal Electrode



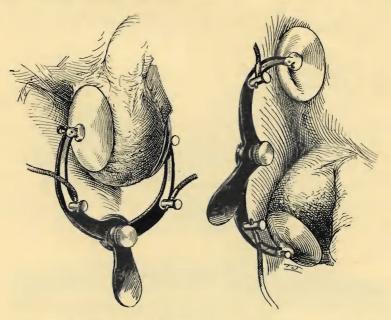
This thermophore was designed by Dr. B. C. Corbus for introducing heat within the body of the epididymis. It consists of a clamp, made of insulating material, with curved arms, one of which is movable. The lock nut at the junction of the two arms holds the adjustable arm in the desired position. The two concave discs may be easily adjusted since they are mounted on swivel joints. These features greatly facilitate the application of the instrument. The two discs are electrically separated—each having its individual binding post to take the usual friction grip terminal.

Regarding this type of electrode Corbus & O'Conor in their book say:

"By using the electrode described above, the gonococcus can be rapidly destroyed in its local invasion obviating prolonged inactivity or operative interference. Our results with this original method have been so uniformly satisfactory that we feel free to describe it as one which is specific for gonorrheal epididymitis."

Cat. No. J6050 Corbus Scrotal Electrode .....

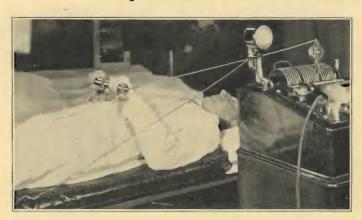
.\$12.00



Shows the enlarged epididymis and accompanying ochitis (exaggerated). The two poles are placed so as to enable the heat to pass directly between the globus major and minor.

Shows the treatment as applied to the lower pole and the vas as it emerges from the external ring. (From Diathermy in the Treatment of Genito-Urinary Diseases, by Corbus and O'Conor; Bruce Pub. Co.)

#### **Duplex Autocondensation Cushion**



This cushion serves a double purpose the design being such that one side may be used for low voltage currents and the reverse for high The voltage. voltage side is equipped with a suitable dielectric material protected by a cleanable covering, and is not padded, while the high voltage side is uphols-

tered in the best grade of silk floss. The low voltage currents are sometimes spoken of as D'Arsonval and the high voltage as Tesla currents.

Condensation cushions are frequently used as the inactive electrode in many types of treatment work. Another arrangement is for the operator to use his fingers as the active electrode while the cushion is the inactive electrode as in the treatment of bursitis, simple conjunctivitis, eye strain, etc.

In regard to autocondensation treatments Harry Eaton Stewart, M. D., in "Diathermy with Special Reference to Pneumonia" says:

"This treatment is used mainly for the relief of hypertension for which it is in most cases quite efficient. There is an undoubted stimulation to glandular metabolism throughout the body especially effecting elimination. There are a few patients suffering from hypertension who do not respond to this treatment. It is quite usual however, in these conditions to have them report a distinct general benefit from its use. Nervous tension is allayed, sleep made more profound and their feeling of well being enhanced as a rule."

Elkin P. Cumberbatch, M. A., B. M., M. R. C. P., in "Diathermy" makes the following statements prior to the presentation of case records in which autocondensation was used:

"When reviewing the results of treatment of various cases by diathermy in order to test the therapeutic value of this method, it was noted that some of the patients improved considerably in their general health, even though the malady for which they were treated had not been alleviated or cured. Many of the patients were thin and fragile, and complained of feeling constantly chilly. Cases of this type were afterwards more fully investigated, and it was found that symptoms, such as loss of appetite, dislike for food, dyspepsia, lack of sleep, depression, etc., were commonly present. The temperature was usually subnormal, the extremities cold, and the body weight low. These patients may be regarded as subjects of deficient physiological activity, especially of the processes concerned in the production of heat and the maintenance of the normal temperature. For these patients diathermy is a rational form of treatment, supplying the heat which the body cannot produce, giving the thermogenetic mechanism a rest and enabling it, in suitable cases, to resume its normal activity."



The cushion is 60 inches long, 22 inches wide and about  $3\frac{1}{2}$  inches thick and connection is made to either the high or low voltage electrode through the same terminal.

Cat. No. J5126 Duplex Autocondensation Cushion ....

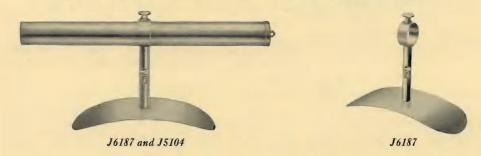
\$58.00

#### Autocondensation Handle Electrode



Cat. No. J5104 Large Metal Handle—an indifferent electrode for application of high frequency currents. Especially recommended in connection with autocondensation \$2.15

#### Abdominal Autocondensation Electrode



An attachment for Victor Metal Handle Electrode J5104 used in the application of high frequency currents with Autocondensation pads.

The abdominal plate increases contact and permits higher milliamperage reading by reducing the resistance in the patient's circuit. It is generally used for conditions requiring more than 600 M. A.

Cat. No. J6187 Autocondensation Electrode (Abdominal) only \$4.00

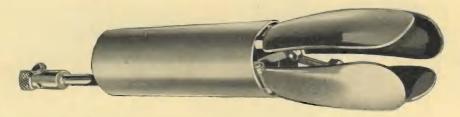
#### High Frequency Foot Switch



The increased and broader use of high frequency equipment has indicated the need for a foot switch primarily intended for use with this type of apparatus.

High frequency currents are hard to control and hence require apparatus specially designed for the purpose. The Victor High Frequency Foot Switch is doubly insulated. The dimensions have been kept within the limits of easy reach so that it may be operated with the foot at normal position. It may be used with any high frequency machine drawing 15 amperes or less.

#### Zener Cervico-Vaginal Electrode



This Electrode provides:

Excellent contact with the cervix.

Fits all sizes of cervices.

Allows measurement of heat generated in the tissues by means of thermometers not in the electrode but in the cervical canal, urethra and rectum.

Allows treatment with patient in a recumbent, relaxed and comfortable position.

The active portion of the electrode consists of four blades attached by means of hinges to a metal tube. The blades are so designed as to fit over the vaginal portion of the cervix. Movement of the blades are obtained by means of an adjusting screw.

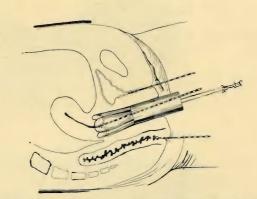
In use, a belt made of electrode foil is applied to the trunk. The patient is placed in the lithotomy position and the electrode inserted either with or without the aid of a Graves speculum. It is much easier to insert with the aid of a speculum.

The speculum is inserted and the cervix brought into view. The electrode with the blades in a closed position is passed into the vagina and the blades opened to the fullest extent. The cervix is viewed through the tube and a thermometer inserted into the cervical canal. The adjusting screw is then operated to cause the blades to close until the patient informs the operator of a sense of pressure on the cervix. The speculum is then withdrawn from the vagina.

It has been found that more uniform heating of the pelvis is obtained if the insulating rubber tube covers the metal tube leaving only the blades exposed.

With this new Zener electrode a more general rise of temperature in the pelvis is obtained than with any other electrode so far developed. It is expected that the availability of this electrode will improve the result obtained with cases where diathermy is indicated as well as extending the field of usefulness of diathermy in treating G-U conditions.

Cat. No. J6267 Zener Cervico—Vaginal Electrode .....\$15.00



Zener cervico-vaginal electrode in position. (Sagital section.) N.B. Bulb of thermometer in rectum should show above and posterior to cervix.

(See Page 33 for further uses of this Electrode)

#### HIGH FREQUENCY (DIATHERMY)

#### Automatic Cord Reel



Offers a convenient means for connecting high frequency machine to electrodes and condensation cushions.

The Victor Cord Reel is perfectly machined and finely finished. The cord is over eight feet in length, each reel being provided with an evenly tempered steel spring, the function of which is to keep the cord taut at all times. The reels are enclosed in polished, cast aluminum cases.

In ordering, kindly specify type of apparatus being used.

Cat. No. A3840 Victor Automatic Cord Reel......\$4.25

#### Cord Reel Hook Adapter

Intended as a connection between electrodes equipped with friction grip and either cord reels or cords with hook connectors.

Cat. No. J6083 Cord Reel Hook Adapter....

#### Binaural Diathermy Electrode



For diathermy in the ears. The ear electrodes are insulated one from the other and are self retaining. The ordinary cord tips fit into the receptacles in the end of the brackets.



\$0.50

Cat. No. J6184 Binaural Diathermy Electrode including two sets of different size tips \_\_\_\_\_\_\_\_\_\$7,50

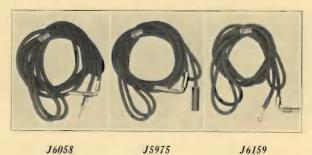
Spring Cuff Electrode

A self retaining, all metal instrument for the application of diathermy to the wrist, arm, calf or ankle. It is quickly adjusted, self retaining, readily cleaned and may be used with all ordinary cord tips.

Cat. No. J6191 Spring Cuff Electrode \$5.00



#### High Frequency Cords



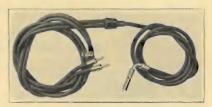
J6058 J5975

The large right angle tip on these cords fits the receptacle on the high frequency machine.

Has friction grip terminal for use with all electrodes except those having threaded stems or rings only Cat. No. J6058 Has threaded connection for use with Victor Surgical diathermy and electro coagulation handles..... Cat. No. J5975 3.50 Insulated Cord with Hook terminal. Cat. No. 16159 2.25

A convenient flexible rubber insulated cord with twin terminals branching out 4 feet away from the post connection. The length over all is 8 feet. Equipped with the same type of terminals as the J6058.

Cat. No. J6082 Bifurcated High Frequency Cord .....\$4.00



#### Universal Diathermy Clamp



This is one of the most practical electrodes yet devised for the application of diathermy to the shoulder. It may be used with equal advantage in the treatment of various joints which usually offer something of a problem when it comes to the securing of proper contact with ordinary electrodes.

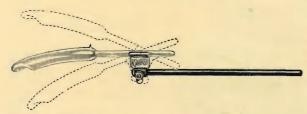
The two round discs (15946 and J5169) shown in illustration are made of heavy electrode foil and conform quite readily to any surface, as the foil is of sufficient pliability to insure close contact over the entire area.

Both discs are held in place by set screws and are mounted upon sliding spring stems, one of which is insulated so as to permit readjustment during treatment. The supporting arch is of cast aluminum.

Cat. No. J5945	Universal Diathermy Electrode Clamp with $2\frac{1}{2}$ in. and $3\frac{1}{2}$ in. flexible discs	12.00
Cat. No. J5946	Flexible Disc Electrode, 2½ in. diameter	1.00
Cat. No. J5169	Flexible Disc Electrode, 3½ in. diameter	1.40

#### Adjustable Vacuum Electrode Handle

(As Suggested by Dr. N. M. Eberhart)



In orificial work this electrode can be inserted by the physician and the handle placed at any desired angle so that the patient can hold the electrode in position. This feature will especially appeal to those who are em-

ploying high frequency currents in the treatment of gynecological, genitourinary, and rectal diseases.

For general surface electrode treatment, this holder is considered as efficient as the straight holder, because the clamps can be securely locked in this or any of the intermediate positions desired.

These metal clamps are made of heavy spring brass, nickel plated.

Cat. No. J5067 Victor Ajustable Vacuum Electrode Handle \$1.95

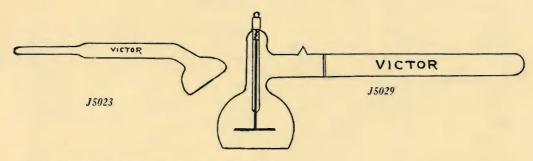
#### Vacuum and Non-Vacuum Electrodes

Either type of electrode produces locally a counterirritant effect upon the skin. The penetration of the heat produced in the tissues immediately beneath the electrode depends upon the machine setting and the distance of the electrode from the patient, although in any case the effect is primarily superficial. The treatment possibly stimulates skin cell metabolism and the activity of the skin glands.

The vacuum type in any standard shape can be furnished on order.

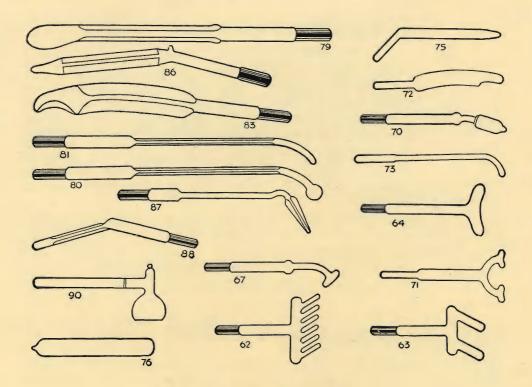
The insulated types of electrodes deliver the energy at the point of application only, while the plain types deliver energy wherever the patient's body comes near or in contact with any part of the electrode.

#### Vacuum Electrodes



Any type of vacuum electrode can be furnished on order.

#### HIGH FREQUENCY (DIATHERMY)



#### Non-Vacuum Electrodes

These electrodes are made of especially selected glass, coated internally. They are made to fit handles with one-half inch clasps unless otherwise specified. Some are now equipped with connection ring for direct contact with the cord reel terminal.

No. 80	Cat. No.	15907	Throat, Insulated	\$5.00
No. 64	Cat. No.		Throat, Plain	
No. 87	Cat. No.		Ear, Insulated	
No. 88	Cat. No.		Nasal, Insulated	
No. 67	Cat. No.		Eve, Plain	
No. 71	Cat. No.		Double Eye, Plain	
No. 90	Cat. No.		Large Surface, insulated handle	
No. 90	Cat. No.		Surface, Area 2 in., insulated handle	5.00
No. 90	Cat. No.		Surface, Area 1½ in., insulated handle	
No. 90	Cat. No.		Surface, Area 1 in., insulated handle	
No. 62	Cat. No.		Scalp or Comb, Plain	5.00
No. 63	Cat. No.		Spinal, Plain	5.00
No. 76	Cat. No.		Autocondensation Handle	
No. 79	Cat. No.		Prostatic, Insulated	
No. 86	Cat. No.		Rectal, Medium Insulated	
No. 86	Cat. No.		Rectal, Large Insulated	
No. 75	Cat. No.		Rectal, Medium, Plain	5.00
No. 83	Cat. No.		Vaginal, Small, Insulated	5.00
No. 83	Cat. No.	15923	Vaginal, Medium, Insulated	5.00
No. 83	Cat. No.	15924	Vaginal, Large, Insulated	
No. 72	Cat. No.	15896	Vaginal, Small, Plain	
No. 72	Cat. No.	15921	Vaginal, Medium, Plain	5.00
No. 72	Cat. No.	15922	Vaginal, Large, Plain	5.00
No. 70	Cat. No.	5912	Fulguration	5.00
No. 81	Cat. No.		Urethral, Insulated	5.00
No. 73	Cat. No.		Urethral, Plain	5.00

### Wantz Multiple Wave Generator



The importance of purity in drugs is universally accepted and there is a growing appreciation of the necessity of purity in electrical currents used for therapeutic purposes. Of course, the engineer speaks of commutator ripple, harmonics and the like instead of purity although the basic idea is the same. With the Wantz Multiple Wave generator you will find as much difference between the currents it delivers and the output of the usual commercial machines as there is between chemically pure and commercial grades of chemicals.

Whether you are using positive galvanism for its coagulative, sedative, vasomotor constrictive, ionic medicative or other proven effects; negative galvanism for its liquefying, vasomotor dilative, irritative, ionic medicative or other established characteristics; sinusoidal current for its muscle stimuluating or other recognized effects, or any of the other therapeutic currents obtainable from this machine you will find the same delicacy of control, purity of wave form, and convenience and reliability of operation.

Reference: The statements made as to the therapeutic value of galvanic and sinusoidal currents are based on the accepted Medical literature of the day. Reprints or references covering any point will be furnished on request.

Send for bulletin on the Multiple Wave Generator.

## The Victor-Sigmond Galvanic Controller



Galvanic treatments may be quickly, efficiently and comfortably administered with this machine. It has a wide range of control, suitable meters and delivers a true galvanic current. The following is a resume of medical literature concerning the important effects of positive and negative galvanism.

#### POSITIVE

- Acid Coagulating and therefore tends to arrest hemorrhage.
- 2. Tends to relieve pain as it is sedative to sensory nerve endings.
- 3. Vasoconstrictive.
- With more intense currents, acid eschar production tendency is noted.
- 5. Repels metal ions such as zinc—the most caustic, copper—less destructive than zinc and used more for its sterilizing and stimulating effects, lithium, magnesium in the treatment of warts, mercury ion—usually in combination with copper or zinc in natural cavities to minimize sticking of the electrode as well as adding to the sterilizing action.

#### NEGATIVE

- 1. Alkaline effect tends to promote softening and dissolution of tissue.
- 2. Vasodilative.
- 3. Irritating and tends to aggravate pain.
- 4. Increased muscle irritability.
- 5. Produces hyperemia and stimulation.
- 6. Repels non-metal ions such as the iodine ion employed in cases when it is desired to obtain adequate penetration without using a concentrated solution, chlorine ion promoting absorption of sclerosed tissue, the salicylic ion for skin affections.

Reference: The statements made as to the therapeutic value of galvanic currents are based on the accepted Medical literature of the day. Reprints or references covering any point will be furnished on request.

Send for bulletin on the Victor Sigmond Galvanic Controller.

#### Suggested Accessories for Galvanic and Sinusoidal Apparatus

#### FOR THE EAR, NOSE AND THROAT SPECIALIST

1—J5723 Eye and Nose Electrode	1—J6230 Electrode Tissue
1—J5724 Double Eye Sponge Electrode	1—J5377 Dispersive Electrode, 4x 6"
1—J6061 Warwick Aural Ionization	1—J5379 Dispersive Electrode, 6x 8"
Electrode	1—J5597 Dispersive Electrode, 10x12"
1—J6148 Electrode Compound	1—A3096 Interval Timer

Price, Complete, \$22.95

#### FOR THE DERMATOLOGIST

1-15783 Hayes Needles, bulbous pointed	1—[5379 Dispersive Electrode, 6x8"
1—J6161 Hayes Needles, sharp pointed	1—J5597 Dispersive Electrode, 10x12"
1—J6148 Electrode Compound	1—]6069 Victor Improved Needle Holder
1—J6230 Electrode Tissue	1—A3096 Interval Timer

1—J5377 Dispersive Electrode, 4x6"

Price, Complete, \$24.20

#### FOR THE G-U SPECIALIST

1—J5377 Dispersive Electrode, 4x 6"	1—J6068 Uterine Cup Electrodes
1—J5379 Dispersive Electrode, 6x 8"	1—15752 Fitzhugh Copper Electrode
1—J5597 Dispersive Electrode, 10x12"	1—J5766 Uterine or Urethral Electrode
1—15732 Vaginal or Prostatic Electrode	with Insulated Staff
1—J5737 Vaginal Cataphoric Electrode	1—J6077 Universal Staff, straight
1—J5734 Goldspohn's Copper Ball	1—J6078 Universal Staff, curved
Vaginal Electrode	1—J6069 Victor Improved Needle Holder
1—[6081 Goldspohn's Intra-Uterine	1—J6148 Electrode Compound
Electrode	1—J6230 Electrode Tissue
1—J6170 Willmoth Silver Endocervical	1—A3096 Interval Timer
Electrode	

Price, Complete, \$73.75

#### FOR THE GYNECOLOGIST

I—Jou/3 Round Sponglo Electrode	1—Joost Goldsponn's Intra-Oterine
1—J5377 Dispersive Electrode, 4x 5"	Electrode
1—J5379 Dispersive Electrode, 6x 8"	1—J6170 Willmoth Silver Endocervical
1—J5597 Dispersive Electrode, 10x12"	Electrodes
1—J6148 Electrode Compound	1—J6068 Uterine Cup Electrode
1—]6230 Electrode Tissue	1—J5752 Fitzhugh Copper Electrode
1—J5732 Vaginal or Prostatic Electrode	1—J5766 Olivary Electrodes, pure copper
1—J5737 Vaginal Cataphoric Electrode	1—J6069 Victor Improved Needle Holder
1—J5734 Goldspohn's Copper Ball	1—A3096 Interval Timer
Vaginal Electrode	

Price, Complete, \$77.45

#### FOR THE SURGEON

1-16066	Improved Electro-Diagnostic	1-15379	Dispersive Electrode, 6x 8"
,	Set		Dispersive Electrode, 10x12"
1-15175	Metal Handle Electrode, large		Copper Fistula Electrode
1-16158	Metal Handle Electrode, small		Rectal Electrode
	Army Disc Electrode		Copper Rectal Electrode for
1-16080	Roller Electrode	3	hemorrhoids
	Spongio-Pilene Disc Electrode	1-16016	Sigmond Needles
-	with stud 1 inch diameter		Victor Multiple Connector,
1-16072	Spongio-Pilene Disc Electrode	3	insulated
	with stud 11/2 inch diameter	1-15551	Victor Universal Handle
1-15709	Spongio-Pilene Disc Electrode		Victor Improved Needle Holder
3	with stud 2 inch diameter		Electro-Diagnostic Handle
1 - 16148	Electrode Compound		Interval Timer
1 - 16230	Electrode Tissue		
	Dispersive Electrode. 4x 6"		

Price, Complete, \$45.80

#### GALVANIC AND SINUSOIDAL

#### FOR THE HOSPITAL

1—I6066 Electro-Diagnostic Set	1—16148 Electrode Compound
1—15724 Double Eye Sponge Electrode	1—16230 Electrode Tissue
1—15783 Hayes Needles, bulbous pointed	1—J5732 Vaginal or Prostatic Electrode
1—J6161 Hayes Needles, sharp pointed	1—J6081 Goldspohn's Intra-Uterine
1—J6158 Metal Handle Electrode, small	Electrode
1—J6095 Army Disc Electrode	1—J6170 Willmoth Silver Endocervical
1—J6079 Metal Disc Electrode	Electrode, set of 4
1—J6080 Roller Electrode	1—16068 Uterine Cup Electrode
1—15560 Hayes Spongio-Pilene Electrode	1—15766 Olivary Electrodes, pure copper
on Block Tin	1—15759 Copper Rectal Electrode for
1—15555 Hand Spongio Electrode	hemorrhoids
1—J6073 Round Spongio Electrode	1—J6016 Sigmond Needles
1—]6071 Spongio-Pilene Disc Electrode	1—]6097 Victor Multiple Connector,
with stud 1 inch diameter	insulated
1—J6072 Spongio-Pilene Disc Electrode	1—15551 Victor Universal Handle
with stud 1½ inch diameter	1—16077 Universal Staff, straight
1—15709 Spongio-Pilene Disc Electrode	1—16078 Universal Staff, curved
with stud 2 inches diameter	1—16069 Victor Improved Needle Holder
1—J5377 Dispersive Electrode, 4x 6"	1—J6076 Binding Strap
1—J5379 Dispersive Electrode, 6x 8"	1—A3096 Interval Timer
1—J5597 Dispersive Electrode, 10x12"	

Price, Complete, \$103.40

#### Eye and Nose Electrode

The active electrode is a copper blade about 1 inch by  $\frac{5}{16}$  inch. The insulated staff is 5 inches long and is equipped with threaded stem to fit Universal Handle J5551. In regard to the use of positive galvanism with a flat copper electrode in treating trachoma, Neiswanger in his book "Electro-Therapeutical Practice"

"The treatment as herein outlined was suggested by the process in vogue for so many years, of applying cupric sulphate by means of a blue stone pencil, which, it will be noticed, always does much good, but the reason it did not make a complete cure was because the copper salt never reached the ultimate ramifications of the granular surface, while with the electrical process it undoubtedly does."

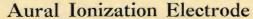
A RATIONAL TREATMENT OF HYPERTROPHIC RHINITIS. Louis Feldman, M. D., The New England Journal of Medicine, May 17, 1928. Page 682.

"1. A monopolar high frequency current from the Oudin coil is applied by means of a non-vacuum flat nasal electrode and is inserted into one side of the nose. \* \* \* It is kept there for about ten minutes, thus producing, after this preliminary treatment, a rather marked hyperemia of the previously pale, boggy hypertrophied membrane. \* \* \*

"2. A flat copper nasal electrode covered with cotton and moistened is then applied against the tissues intra-nasally and attached by means of an insulated wire to the 'active' positive pole of a galvanic apparatus, the larger indifferent moistened pad, size 6 x 4, coming in contact with the patient's chest in the sternal region anteriorly. \*\*\* Then the current is gradually turned on, taking into consideration both the patient's feelings and the milliampere meter reading. The average dosage used was about three to eight m.a. for about ten minutes; then the entire process preceded by the high frequency treatment is repeated in the other side of the nose. \*\*\*

"The average number of treatments given was ten. The interval between treatments was about forty-eight hours. The average duration of treatment was twelve minutes. In the 50 cases observed and treated, the results were as follows: Relief or improvement was first noticed after about the fourth seance, manifested by both symptoms and signs, subjective and objective. \* \* \* Our conclusions were as follows: Total number of cases treated, 50; total number of treatments given, 512; total number cured, 28 (56%); total number improved, 12 (24%); total number unimproved, 10 (20%)."

Cat. No. 15723 Eve and Nose Electrode.





The glass speculum serves as an easily sterilized, non-porous container for the solution and prevents the zinc electrode from touching the skin. The cord terminal fits into the end of the zinc electrode. This is the Warwick type ionization electrode.

With galvanic currents metal ions are driven away from the positive electrode. "Zinc ions, whether derived from a zinc needle or from a solution of the salt, when introduced into a solution of albumen coagulate the albumen. As cells —tissue cells, blood cells and bacteria—are com-posed largely of albumen they also can be coagu-lated and therefore killed. Zinc ionization (and

zinc electrolysis) are therefore antiseptic procedures, and they have proved to be of great use in the treatment of chronic otorrhoea."

ZINC IONIZATION AND ZINC ELECTROLYSIS IN THE

TREATMENT OF CHRONIC OTORRHOEA. By A. R. Friel, M. A., M. D., F. R. C. S. I., in American Journal of Electrotherapeutics and Radiology, October, 1921.

Cat. No. 16061 Aural Ionization Electrode

#### Double Eye Sponge Electrode



A convenient electrode for treating the eyes. Negative galvanism (vasodilator) with this electrode is used to stimulate sluggish circulation in bruises.

Practical Index to Electrotherapy, by Waddington.

Cat. No. J5724

Double Eye Sponge Electrode, including \$2.50 handle ....

#### Rectal Electrodes



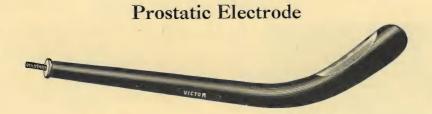


These rectal electrodes are both  $5\frac{1}{2}$ " long overall with a tip portion  $2\frac{1}{2}$ " in length and a maximum diameter of 3/8".

The following quotation is from an article entitled "Some Facts About CHRONIC CONSTIPATION," by Dr. William Wolf, October, 1927 issue of Medical Review of Reviews.

"In cases where the rectum has been distended and its walls relaxed and weakened by accumulated feces, or too frequently repeated and incorrectly given enemas, the following method will give excellent results: place an indifferent large electrode upon the abdominal wall, and an intrarectal copper or nickel electrode into the anal canal and pass the sinusoidal current through, very gradually and then step by step move the rectal electrode up as far as it will comfortably go. This is an excellent method in properly selected cases and has given splendid results where other methods have utterly failed.'

Cat. No. J5758 Rectal Electrode, nickel plated, insulated...... Cat. No. 15757 Rectal Electrode, all metal, nickel plated......



This electrode, designed by Dr. C. W. Bowen, is used with surging sinusoidal current for massaging treatment of the prostate gland.

Cat. No. J5764 Prostatic Electrode

#### Sigmoid Electrode

A curved insulated stem with large olive shaped electrode tip of nickeled metal and designed to fit Victor Universal Handle J5551.



"It is used in the treatment of constipation with sinusoidal current."—Practical Index to Electrotherapy, by Waddington.

"SIGMOID IMPACTION. This condition when due to an atonic state of the musculature of the lower bowel may be treated along the lines just given and in addition there may be given internal rectal application of one electrode, the other being placed on the lower abdominal wall. Either the sinusoidal or wave galvanic current may be employed. The lower bowel should be thoroughly cleaned out before treatments."—Physiotherapy, by Stewart.

Cat. No. J5732 Sigmoid Electrode

.\$3.50

#### Copper Rectal Electrode



GALVANISM IN THE TREATMENT OF INTERNAL HEMORRHOIDS, WITH REPORT OF CASE. A. L. Kincheloe, Owensboro, Ky., Kentucky Medical Journal, September, 1927. Page 514.

This author says that he is "quite sure that Galvanism is as effective in the treatment of internal hemorrhoids as surgery,

and has many advantages over any radical operation in that there is no danger of hemorrhage, attended with practically no pain in uncomplicated cases, no slough, no protrusion after the first one or two treatments. The results are produced by chemical changes in the hemorrhoid and not by burning or cauterizing as we may suppose. There is no destruction of tissue, hence no danger of infection."

The electrode consists of a copper bulb mounted upon a short insulated staff in the end of which is a receptacle to take the friction grip terminal. When inserted the sphincter muscle grasps the stem near the end of the insulated surface holding it in treatment position.

Cat. No. 15759 Copper Rectal Electrode .....

...\$3.00

#### Zener Cervico-Vaginal Electrode



This electrode has four blades which fit over the vaginal portion of the cervix. The active galvanic electrode such as the J6081 Intra Uterine Electrode may be inserted into the cervical canal.

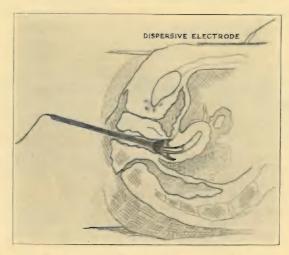
With such an arrangement the Zener Electrode replaces the usual dispersive electrode, giving better control of the current to the part under treatment and eliminates the current passing through any part of the body except that under treatment.

(See Page 22 for further uses of this Electrode)

Cat. No. 16267 Zener Cervico-Vaginal Electrode...

..\$15.00

#### Intra-Uterine Electrodes



In regard to endocervicitis caused by organisms other than gonococcal, Dr. E. P. Cumberbatch in "Clinical Medicine," April, 1926, "Galvanotherapy in the Treatment of Endocervitis" says:

"For the first three applications I use the metal (zinc or copper) electrode connected to the negative pole. That is followed by physiological changes of which the most important known is increase in secretion from the mucous glands. That is obvious; you can see it, and it persists a long time after the current has ceased. The glands which form the major portion of the tissues of the cervix are freely drained from within outwards. Other changes take place. There is an exudation of fluid, perhaps lymph from the tissues of the cervix. That has the effect of giving a thorough drainage to the infected cervix.

"On the fourth application I use the same electrode and connect it to the positive pole and cause ions to migrate into the tissue.

"I differ from other men in this respect in using much bigger currents than other people do. The French workers recommend twenty to twenty-five milliamperes. I go up to fifty, sixty, seventy or eighty, and I have been up to one hundred milliamperes.

"Now, what have I done? I have produced a lining of zinc albuminate along the canal of the cervix. The tissues in contact with the metal for perhaps a millimeter or so deep

#### GALVANIC AND SINUSOIDAL

are converted into a firm membrane of zinc albuminate, and it is a sterile membrane.

"I, myself, having done that, prefer not to pull the electrode out by force and bring tissue with it, but rather to reverse the current for a minute to soften the tissue a little and bring the electrode out easily, because it is my personal belief that a good part of the value of that treatment is due to the covering of the infected canal of the cervix with a sterile membrane which stays there and persists there for perhaps a week or ten days or longer. As it is a sterile membrane infection cannot grow upon it from the outside.

"That is the method which I adopted with success in treating infected endocervicitis."

The Office Treatment of Gynecologic Patients. Walter T. Dannreuther, M. D., F. A. C. S., New York, *The West Virginia Medical Journal*, February, 1928. Page 53. "Negative pole of the galvanic current, applied to a muscle covered with a mucous surface, promotes glandular secretion, relaxes muscle fibres, and stimulates circulatory activity; its possibilities in cases of cervical stenosis, antiflexion, and uterine hypoplasia are apparent."



The set consists of four slightly curved copper electrodes of different sizes with a 16077 straight staff. The electrodes are of the Goldspohn type and their universal popularity is an indication of their value in intra-uterine treatments.

Cat. No. J6081 Intra-Uterine Electrodes, set of 4 with one staff... \$6.00

#### Uterine Cup Electrodes



This electrode consists of an insulated stem supporting an insulated metal cup which is manipulated to push the organ into normal position and then acts as a support to the prolapsed uterus during treatment.

Cat. No. J5751 Uterine Cup Electrode (nickel plated cup) with insulated stem....\$4.50 Cat. No. J6068 Uterine Cup Electrode (copper cup) with insulated stem......4.50

#### Copper Os Electrode



The copper face is designed to fit the normal os—the remainder of the electrode consisting of an insulating shaft with a terminal which fits the Universal Handle 15551. This type of electrode was designed by Fitzhugh.

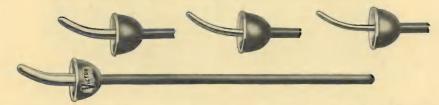
"The treatment of erosions by metallic cataphoresis while quite successful, is never permanent so long as the exciting cause is allowed to continue.

"Acrid discharges from the uterus due to endometritis, salpingitis and pyosalpinx, are the principal causes of erosions of the os, and should receive attention before we can hope to effect a permanent cure. As it is, however, always considered good practice not to ignore symptoms even while treating the cause, we believe it advisable to treat the erosions and keep the os in as healthy a condition as possible."—Electro-Therapeutical Practice, by Dr. C. S. Neiswanger.

Cat. No. J5752 Copper Os Electrode

\$4.00

#### Willmoth Silver Endocervical Electrodes



Inasmuch as silver in some form has invariably enjoyed a reputation in the treatment of generative tract pathologies involving infection, Dr. Willmoth has devised endocervical electrodes of this material to be used for ionization. Not only do the electrodes fit the cervical canal, but inasmuch, according to Dr. Willmoth, as endocervicitis is practically always associated with some degree of cervical erosion and infection, the Willmoth electrodes present a surface which fits the external os at the same time that the intra-cervical applicator fits the cervical canal.

These electrodes are modeled from anatomical considerations and definitely supersede all other forms of electrodes in the satisfactory treatment of cervical and endocervical pathologies with silver ionization and positive galvanism. They are assorted in four sizes which, by experience, are found to meet satisfactorily any usual clinical case.

Cat. No. J6170	Willmoth Silver Endocervical individual handles	Electrodes, set of	4, mounted on \$27.00
Cat. No. 16166	Willmoth Silver Endocervical		
Cat. No. J6167	Willmoth Silver Endocervical	Electrodes, single,	small—12F 7,50
Cat. No. J6168	Willmoth Silver Endocervical	Electrodes, single,	med.—17F 7.50
Cat. No. J6169	Willmoth Silver Endocervical	Electrodes, single,	large—21F 7.50

#### Uterine Set



A combination electrode, designed by Dr. W. J. Tyndall,

for the application of either diathermy, galvanic or sinusoidal currents to the uterus, the cervical canal and the external os in the same application.

The instrument consists of a well insulated staff with copper cup to which may be attached any of the six assorted bougies which are a part of the set. Receptacle in the end of the staff takes the usual friction grip cord terminal.



Cat. No. J6203 Victor Uterine Set, complete...

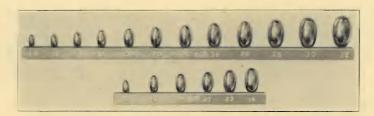
.\$12.00

#### Olivary Electrodes

"STRICTURE. Our experience in the treatment of scar tissue elsewhere would indicate that favorable results are to be expected in the intelligent application of ionization (negative galvanism) to this condition and a sufficient number of workers have secured gratifying results to warrant the presentation of their methods."—Physiotherapy, by Stewart.

Cumberbatch's "Essentials of Medical Electricity" also contains information on the treatment of strictures.

With negative galvanism either copper or nickel plated electrodes may be used. With positive galvanism the copper electrodes should be used as the nickel



plated would become corroded. The copper electrodes with positive galvanism are said to produce a styptic action and function more as a vasoconstrictor.

The olivary electrodes may be used with staffs of the J6077 or J6078 types and are furnished with bar as shown for mounting. A complete set of olivary electrodes should be available so that there will be no sacrifice in efficiency of application.

Cat. No. J5766 Olivary Electrodes, copper, set of 12 (without staff) \$4.50 Cat. No. J5767 Olivary Electrodes, nickel plated, set of 6 (without staff) 3.50

### Universal Staffs



These are the types of staffs used with the olivary, the J5765 uterine or urethral and the intra-uterine electrodes. The staffs are insulated and have threaded stems at one end to fit handles such as the Universal J5551, while the other end has a threaded stem to take the various electrode tips.

A straight stem is needed for the upper urethra while the Van Buren curved unit is useful in the deeper urethra.

Cat.	No.	J6077	Universal	Staff,	straight	\$1.5	50
Cat.	No.	J6078	Universal	Staff,	curved	1.5	50

# Copper Fistula Electrode



The tip of the electrode is of a bulbous shape, which permits easy introduction to the affected tract.

In regard to the use of positive galvanism, Neiswanger in "Electro-Therapeutical Practice," says:

"Those who have treated fistulous tracts by metallic cataphoresis are enthusiastic in praise of the method, and, in the author's experience, the results have been everything that could be desired. By the aid of a local anesthetic the treatment may be given with little or no pain, the patient is not obliged to quit his usual work and the results are as permanent as can be obtained by the most radical surgical procedure."

### Uterine or Urethral Electrode With Insulated Staff



The staff is insulated and threaded to fit Victor Universal Handle. The use of a copper electrode with negative galvanism and sinusoidal current in the treatment of infantile uterus is discussed in "Physiotherapy," by Stewart. "Infantile Uterus. Prof. B. C. Hirst of the University of Pennsylvania has described a technique which has been very successful in the development and restoration to function of the infantile type of uterus. It is usually preceded by cervical dilation and a course of corpus lutium and pituitary extract which alone often gives no results. He based his work on the theory that the uterine muscle can be developed by electrical stimulation as can any other atrophied or poorly developed muscle."

Cat. No. J5765 Uterine or Urethral Electrode with insulated staff.....

# Vaginal Cataphoric Electrode



Neiswanger's Vaginal Cataphoric Electrode. This instrument consists of a ball of pure copper pierced by numerous holes and attached to an insulated tube equipped with a nozzle for connection to a syringe. There is also a receptacle for the conducting cord terminal.

"If, in the whole realm of therapeutics, there can ever be absolute assurance of success, it is in the field of ionization for septic disease."—*Electrotherapy in Gynecology*, by Dr. Samuel Sloan.

In treating vaginitis, the vaginal orifice is occluded and the vaginal canal is distended with a solution of zinc sulphate.

Reference: "Electric Ionization," Friel.

Cat. No. J5737 Vaginal Cataphoric Electrode

\$4.50

\$1.50

# Copper Ball Vaginal Electrode



"This is the Goldspohn type and may be used as the active pole in vaginal-abdominal and vaginal-dorsal applications of low voltage energy. This electrode is used with negative galvanism in the treatment of leucorrhoea and with slow sinusoidal in uterine subinvolution."—Practical Index of Electrotherapy, by Waddington.

The copper ball,  $\frac{3}{4}$ " diameter, is attached to a curved insulated stem which in turn may be attached to a handle such as the J5551.

Cat. No. 15734 Copper Ball Vaginal Electrode...

S2.25

### Hemorrhoidal Needles



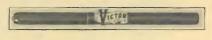
These needles are insulated from the contact connection down to a point about  $\frac{1}{2}$ " from the tip. They are steel needles  $2\frac{1}{2}$ " long and fit the Needle Holder J6069.

Sigmond, in an article on the use of positive galvanism in the treatment of hemorrhoids, says:

"The method far surpasses urea and quinine hydrochloride injections. It should be used on those cases for which the injection treatment is especially suitable." "Positive Galvanism for the Treatment of Hemorrhoids," by H. W. Sigmond, M. D., in *Victor Service-Suggestions*, July-August, 1924.

# Victor Improved Needle Holder

An insulated, adjustable handle  $5\frac{1}{2}$  inches long; intended for use with hemorrhoidal needles, Hayes needles and others of the



same type. Adapted for connection to all Victor cords with tapered friction grip terminals. The needle is retained by a chuck.

Cat. No. J6069 Victor Improved Needle Holder....

\$1.50

### Electrode Cords

High quality, flexible, insulated cords with the usual tapered friction grip terminals on both ends.

Cat. No. J5822 Electrode Cord, 8 ft. long, pair...\$1.75



# Hayes' Needles

These needles are made of English steel. They are used with J6069 handle.

Cat. No. J5782	Hayes' Bulbous Pointed Needle	50.25
Cat. No. J5783	Hayes' Bulbous Pointed Needles (in packages of 1 doz. each)	2.50
Cat. No. J6160	Hayes' Sharp Pointed Needle	.25
Cat. No. 16161	Hayes' Sharp Pointed Needles (in packages of 12)	2.00

### Roller Electrode



A nickeled metal roller mounted on an insulated handle with direct connection to the cord. It is so constructed that the operator may propel it freely over the area under treat-

ment, using whatever degree of pressure may be indicated in applying the desired energy. A chamois skin jacket is usually sewed on the roller to make the treatment more pleasant and effective.

In the treatment of irritable nerve trunks positive galvanism using the roller electrode covered with chamois skin saturated with sodium bicarbonate solution is often used over the sensitive area to allay pain.

Painful Points and Electric Resistance of Skin. M. Kaufmann and H. Weiss, Deutsche Medizinische Wochenschrift, Berlin, September 16, 1927.

Abst. Jour. Am. Med. Assn. (December 10, 1927). Page 2075.

"Increased permeability of the skin for the galvanic current was noted by Kaufmann and Weiss at all those sites at which palpitation had revealed painful points along nerve trunks. The decrease of resistance was proportionate to the local hyperesthesia. The patients examined suffered from rheumatic and neuralgic pains in the extremities, headaches and other disturbances, the only objective symptoms of which were the painful points. The painful points were successfully treated by the galvanic current with the anode applied to the site of pain. When larger areas were affected, a roller was used. With the disappearance of pain the resistance of the skin to the current also became normal."

Cat. No. J6080 Roller Electrode, complete with handle \_\_\_\_\_\_\$1.75

# Improved Electro-Diagnostic Set

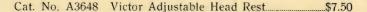


This set, consisting of an interrupting handle connected to an extension stem holding three assorted metal disc electrodes J6079, is very useful in treatment and diagnostic work.

Cat. No. J6066 Electro-Diagnostic Set \$5.00 Cat. No. J6067 Interrupter Handle only 3.50

# Adjustable Head Rest

This is a strongly built head rest, easily adjusted to any position, comfortable to the patient, and readily adapted to any office chair.





### Interval Timer

In Physical Therapy there is generally a given length of treatment which will give the best average results. Either more or less than the time specified may easily be responsible for failure or may lead to inconsistent results or may contribute to inefficiency in the operation of the clinic.

Treatment rooms may be economically equipped with a suitable number of Victor Interval Timers without any great expenditure and these units will assist considerably in the attainment of uniform technique and results.

The Victor Interval Timer is entirely mechanical and requires no electrical connection of any sort. It may be suspended from a hook or stood on a table and it is always furnished complete with base



as shown. The dial gives a simple direct reading and an alarm sounds at the end of the period for which the Timer was set. The Timer will give a warning at the end of any period from fifteen seconds to two hours and even longer periods may be timed by resetting at the expiration of the two hours.

Cat. No. A3096 Victor Interval Timer

...\$5.00

# Automatic Electric Treatment Timer

# for Physical Therapy Apparatus



Automatically turns off the current at expiration of time period for which it was set. A signal sounds whenever current is cut off.

Maximum safety is insured by a "Patient Release" with which the patient can cut off the current instantly in an emergency.

Current can be turned on or off as many times as desired during treatment; the Timer automatically computes the various periods of actual treatment and cuts off current automatically at expiration of total time.

Times from one to fifty-five minutes. Can be used on any diathermy machine, quartz mercury vapor lamp, carbon-arc, infra-red, or radiant heat lamp, galvanic or sinusoidal apparatus that consumes not over 15 amperes at 110 volts or 7½ amperes at 220 volts, A. C. or D. C.

Always accurate. No winding up necessary; winds as you set it.

Cat. No. 16189 Automatic Electric Treatment Timer

.\$35.00

### Victor Electrode Tissue



Victor Electrode Tissue is a flexible, transparent, non-metallic, permeable tissue used between metal electrodes and the skin.

It is an ideal conductor of electricity when moistened on one side with Victor electrode compound and applied to the area under treatment. It is not necessary to moisten the side which is used next to the patient. The electric current will pass through the electrode tissue which has been coated with electrode compound. This electrode tissue is used for Sinusoidal, High Frequency, Galvanic and other types of electrical treatments.

Since the cost of a piece of suitable size for a treatment is very small the material should be discarded at the end of the treatment and a new piece used for the next treatment.

The use of Electrode Tissue offers the advantages that it is not necessary to smear electrode compound on the patient's skin or to use felt or other solution-soaked substances. As can be readily confirmed by tests the Victor Electrode Tissue coated with Victor compound passes current as readily as any of the other combinations used in conducting currents through the patient's body.

It does not favor bacterial growth, it is not subject to decomposition and it is no more inflammable than ordinary paper.

Its use solves the old problem of electrode contact and introduces the welcome feature of economically providing a new, clean, wholesome surface for successive cases.

Cat. No. J6230 Package Victor Electrode Tissue (about 6,000 square inches) \$2.70

### Electrode Compound

An improved product consisting of a gelatinous mass put up in collapsible tubes. A small quantity is rubbed both on the skin and on the electrode contact surface, or if Electrode Tissue is used the



compound is placed on the side next to the electrode. It has the property of remaining moist for a sufficient length of time to suit any treatment; furthermore, it is a splendid conductor. Those who use diathermy, galvanic or sinusoidal current will find this item very satisfactory.

Cat. No. J6147	Electrode Compound	in Collapsible Tube\$0.25	5
Cat. No. J6148	Electrode Compound	(box of 12 Tubes) 250	0

### Electrode Foil



Diathermy to the ears by double plate method using foil.

Electrode Foil is inexpensive, flexible, easy to apply and furnishes adequate contact. When used in conjunction with the Victor Sand Bag Set, Elastic Bandage and the Compression Bladder, this foil, cut to various shapes and sizes makes possible an efficient method for obtaining effective contact for treatments such as the double plate, the plate-cuff and the double cuff methods.

Electrode Foil, light weight, 12" wide, .005" thick, Cat. No. J6181 Ap-36 gauge. proximately square feet to the pound, per pound \$0.75 For 10 pounds or

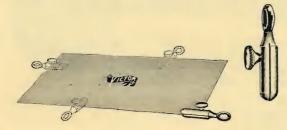
over, per pound..... Cat. No. A3131 Electrode Foil, medium weight, 12" wide, .016" thick, 25 gauge. Approximately 1 square foot to the

> .50 over, per pound.....

pound, per pound For 10 pounds or Cat. No. J6037

Electrode Foil, heavy weight, 12" wide, .036" thick, 19 gauge. Approximately 2 pounds to the square foot, per pound. For 10 pounds or over, per pound.

### Electrode Foil Connector



This connecter consists of a nickel-plated split bushing equipped with set screw and ring. It is used as a union between a cord reel hook and the electrode foil.

Cat. No. J5136 Electrode Foil Connector .....\$0.75

# Electrode Clip Connector





A spring clip device for use with flexible metal mesh electrodes, spongio-pilene, electrode foil and other materials used for the application of electric currents. This clip affords good contact, is of sufficient strength to hold securely in place, and is equipped with receptacle for friction grip terminal.

Cat. No. J6033 Electrode Clip Connector ....

\$0.35

### Flexible Connector for Electrode Foil



Made of flexible braided metal—one end has a spring clip to hold various cord tips. The flat end is held in contact with the foil by a strip of adhesive tape.

# Cord Tips





Cat. No. J5540 Victor Adjustable Cord Tip.....

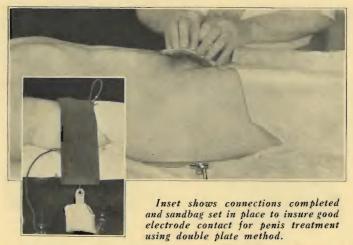
S0.35



Cat. No. J5543 Universal Cord Tip Adapter, to connect cord tips of any cord with Victor equipment or electrodes having receptacles for friction grip terminals......\$0.40



### Sand Bag Set



Provided for the purpose of supporting or immobilizing any part of the body to be treated. Sand bags are indispensable for buttressing electrodes in place where bandages would be inadequate such as the shoulder joint and broad areas of the body. The illustration shows one of the innumerable positions in which the set can be used.

This set consists of a cloth compression band 32 inches long and  $5\frac{1}{2}$  inches wide, having at both ends a metal rod to keep it perfectly flat when in position. In the metal rod is fixed a hook on which to hang the sand bags. One end of the band may be attached to the table, then brought over the part with a sand bag attached to the other end.

Two sand bags are supplied, one 5 inches wide and 11 inches long; the other 11 inches wide and 11 inches long.

Unless otherwise ordered, the set will be shipped without sand to save transportation charges.

Cat. No. A3423 Sand Bag Set

.....\$2.50

# Woven Elastic Bandages



Bandages of woven elastic material offer one of the most convenient means for holding electrodes and connectors in place. These woven elastic bandages are made of best long staple Sea Island cotton and possess the elastic qualities of rubber bandages, but contain no rubber. They can be sterilized by boiling or washed without injury. The porous weave insures coolness and comfort, and the soft feathered edges will not ravel, adding greatly to the life of the bandage. The bandages stretch without narrowing, roll evenly without need of reversing, fit comfortably and exert a constant firm pressure which can be varied to meet conditions.

When these bandages are washed with soap and warm water and dried on a flat surface without stretching, the elasticity, which is somewhat lost by steady use, is entirely restored.

Cat. No. J6152 Roll Woven Elastic Bandage, 21/2" wide.....

.\$0.85

### Rubber Bandage

Victor rubber bandage is made of pure gum rubber three inches wide and nine feet long.

It is used by many operators as a means of binding the electrode in position and holding it securely during treatment.

It is easily washed and may be used repeatedly without noticeable deterioration.

Cat. No. J6180 Pure Gum Rubber Bandage......

\$1.75

# Compression Bladder



Showing positions of electrodes for application of diathermy to shoulder—anterior-posterior method. Note inflated rubber compression bladder under shoulder to insure even contact of foil electrode on skin surface. Inset shows connections completed and with sand bag set to insure even contact of other foil electrode.

The advantage of this device lies in its action of forcing contact between the electrode and the skin. It may be used either as a pillow, if the electrode is to be placed under the patient, or as an air bag between the electrode and a suitable bandage when used in other positions.



Being air inflated it conforms readily to contour, equalizing pressure where it is most needed.

The Victor compression bladder is made of pure para rubber with a single seam so as to present a uniform contact surface under air compression.

Cat. No. A3407 Victor Compression Bladder ...

...\$1.75

# Binding Strap



Intended to use as a means of securing disc electrodes in whatever position they are to be used. This strap, made of stout cotton webbing, is used for holding electrodes, especially the disc type, in position and is equipped with an eyelet through which the electrode disc stem may be connected with the contact cord.

Cat. No. J6076 Binding Strap for use with all disc electrodes.....

.\$0.75

### MISCELLANEOUS ACCESSORIES



Slow smooth Sinusoidal Treatment to Radial nerve or its muscles by Bipolar method for conditions such as radial paralysis, trauma of wrist joint, edema of forearm, etc. Note the use of sand bag and compression bladder to maintain wrist at cock-up position to avoid overstretching extensor muscles. Use two disc electrodes 1½" (J6072) with one J5551 Handle, J6076 Binding Strap and J6033 Clip Connector.

# Spongio-Pilene Disc Electrodes

Metal discs with spongio-pilene contact and equipped with a threaded stem to fit the J5551 Universal Handle and the J6066 and J6067 Electro-Diagnostic Handles. Use J6033 Clip Connector to connect cord to Disc Electrode if handle is not used.



Cat.	No.	J6071	Spongio-Pilene	Disc	Electrode	with	Stem,	1"	diameter\$6	0.95
Cat.	No.	J6072	Spongio-Pilene	Disc	Electrode	with	Stem,	11/2"	diameter	.95
Cat.	No.	J5709	Spongio-Pilene	Disc	Electrode	with	Stem,	2"	diameter	.95

For treatment of conditions such as paralysis of the anterior tibial muscles and injuries to the ankle joint. The slow smooth sinusoidal is used for paralysis and rippled slow sinusoidal for injuries other than flaccid paralysis. Note the use of the sling for foot drop. Electrodes: 2 Discs, 1½" (16072), 1 Handle (15551), 1 Strap (16076) and 1 Clip Connector (16033).



### MISCELLANEOUS ACCESSORIES

# Round Spongio Electrode



A flexible spongio-pilene electrode attached to a circular piece of soft rubber fabric through which the current is delivered by means of a metal connector.

Cat. No. J6073 Spongio Electrode, rubber insulated (3-inch diameter) \$1.50



Rippled sinusoidal current being used for treatment of abdominal flaccidity. Electrodes—2 rubber insulated spongio electrodes. Treatments are also given using one electrode on abdomen and other under sacrum.

### Hand Spongio Electrode



Cat. No. J5555 Spongio Covered Electrode, with soft rubber insulation for general application with the hand \$2.25

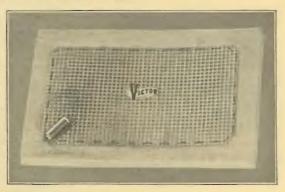
# Dispersive Electrodes

Made of flexible, perforated metal with covering of spongio-pilene over the anterior surface. Equipped with receptacle to take the usual friction grip terminal.

Cat. No. J5377 Dispersive Electrode, 4x6"..........\$1.50

Cat. No. J5379 Dispersive Electrode, 6x8"......... 2.75

Cat. No. J5597 Dispersive Electrode, 10x12"..... 3.75





Slow smooth sinusoidal used in the treatment of deltoid paralysis or injury to the shoulder joint, such as sprains and dislocations. The arm is raised to the level of shoulder to secure greatest shortenings of the muscle fibers. Towel is used between hand and dispersive electrode. 4x6 Dispersive Electrode (15377), 1½" Disc Electrode (16072) and Handle (15551) used.

# Hayes' Spongio-Pilene Electrode On Block Tin



Back



Face

Constructed of spongio-pilene felt permanently attached to a piece of flexible metal equipped with proper connector to fit Victor attachment cords. Diameter, 81/4 inches.

Cat. No. J5560 Dr. Hayes' Spongio-Pilene Electrode on Block Tin......\$2.90

### Flexible Metal Fabric Electrodes



Flexible metallic mesh with Victor Electrode Tissue and Compound gives one of the most satisfactory combinations for the application of electric currents to many parts of the body.

One of the conveniences of this material is that the operator can cut up his own electrodes to suit himself. Metal mesh can be sterilized in steam or in boiling water, just as any other instrument.

The technique of application is to place the Electrode Tissue on the skin, coat the surface of the tissue with electrode compound and then place the Metal Fabric Electrodes over the tissue. The result is better contact and elimination of objectional faradism.

Cat.	No.	16017	Flexible	Metal	Fabric	Electrode,	12x12"	\$6,00
Cat.	No.	[6018	Flexible	Metal	Fabric	Electrode,	5x12"	5.50
Cat.	No.	J6019	Flexible	Metal	Fabric	Electrode,	4x 6"	1.25
								3.50
Cat.	No.	J6021	Flexible	Metal	Fabric	Electrode,	12x 6"	3.25
								6,00
Cat.	No.	J6023	Flexible	Metal	Fabric	Electrode,	36x 8"	12.00
Cat.	No.	J6024	Flexible	Metal	Fabric	Electrode,	36" width,	per foot18.00

# Spongio-Pilene





Shows the use of two 3x6" double thickness of Spongio-Pilene with rubber sponges and Clip Connector J6033 in the treatment of atonic constipation using very slow, smooth sinusoidal (to correspond to normal peristalic rhythm) through involuntary nervous system. Electrodes are being held in place as patient reclines to assume position for the treatment.

Spongio-Pilene is a pliable material which absorbs and retains moisture. It is used as an electrode for high frequency, sinusoidal and galvanic treatments.

### MISCELLANEOUS ACCESSORIES

# **Multiple Connectors**



J6097

A means of providing several connections from a single pair of Binding Posts. They are metal blocks equipped with holes into which friction grip terminals may be inserted for multiple connections. Adapted to use with Victor cords. Cat. No. J6097 Victor Multiple Connector, Insulated \$1.60



Pronated feet treatment using rippled slow sinusoidal current to external popliteal nerve. 2 Disc Electrodes, 3" (J5079), 2 Straps (J6076), 6 Cords (J5821), 2 Multiple Connectors (J6097), 4 Clip Connectors (J6033) and oblong tin pans.

### Victor Universal Handle



This is a wooden handle with two terminals, one for the cord tip (usual friction grip type) and the other to accept Disc Electrodes, and other electrodes having threaded stems.

Cat. No. J5551 Universal Handle only...

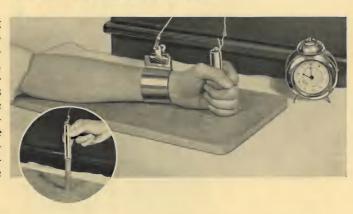
\$0.45

Treatment of paralysis of the facial muscles with slow smooth sinusoidal current using 4x6" Dispersive Pad (J5377) and 1½" Disc Electrode (J6072) with (J5551) Handle. Use towel between patient's hand and chest electrode.



### Metal Hand Electrodes

For Diathermy wrist treatment of conditions such as synovitis, neuritis, strains, sprains, traumatic injuries and arthritis this Hand Electrode is often used in connection with the Spring Cuff Electrode or with Electrode Foil around the wrist.







J5175

J6158

Cat.	No.	J5175	Metal	Hand	Electro	de\$1,30
Cat.	No.	J6158	Small	Metal	Handle	Electrode \$0.65

### Metal Disc Electrodes



Set of three nickel plated convex discs mounted on threaded stem arranged to fit our J5551 Universal Handle. The diameter of each of these electrodes is as follows: 1 in.,  $1\frac{1}{2}$  in., 2 in.

Cat. No. J6079 Metal Disc Electrodes, set of three, with stem......\$2.00

### Army Disc Electrode

This is a Universal electrode of general utility for the application of various currents or modalities in a wide variety of cases.

The cord tip connection is adjustable to all types of cord terminals. The metal disc is  $2\frac{1}{4}$ " in diameter with rounded edges and is heavily



nickel plated throughout. The handle is of finely finished insulating material.

### Putman Sand Bag

Convenient for holding electrodes in place on different parts of the body such as chest, shoulder, back, legs, etc.

Cat. No. J6204 Putman Sand Bag \$1.25

# VICTOR QUARTZ LAMPS

for Ultraviolet Therapy



Victor De Luxe Combination Air-Cooled and Water-Cooled Quartz Lamp

"The Quartz Mercury Vapour is the most generally suitable lamp for employment in private practice or in small clinics.

"It is easy to use, effective, rapid in its action, rich in ultraviolet light of therapeutic value, clean, economical both in first cost and current consumption, suitable for either a general light bath or local treatment. It occupies little space, and is easily installed in a doctor's consulting room.

"It is, therefore, not to be wondered at that it has achieved great popularity, and has been very generally advocated and adopted."

-Sir Henry Gauvain, M. D., Chir. (Cantab.), in his introduction to J. Bell Ferguson's "The Quartz Mercury Vapour Lamp."

Write for booklet: "A Few Facts Pertinent to the Consideration of Artificial Sources of Ultraviolet Radiations," and the bulletin on Quartz Lamps.

### ULTRAVIOLET

# The Selection of Applicators for Ultraviolet Therapy

N LOCAL treatments, skin or cavity, the range of application of the Air-Cooled and Water-Cooled lamps depends on the variety of applicators available.

When ordering any of the applicators listed herein, be sure to include in the order the holder which is required for that particular applicator. The holders are listed separately, in view of the fact that one holder will usually serve for several applicators with the same size of shank.

Victor quartz lenses are made of the best grades of quartz and are comparatively free from blemish, thus insuring good transmission of ultraviolet rays.

The holders are quickly and easily attached, and will remain fixed in position throughout the treatment.

We will gladly assist in the selection of applicators and accessories best suited for a given range of service.



### REPAIRS

Broken quartz rods can be repaired in most instances, the cost averaging about \( \frac{1}{3} \) the listed price of the applicator.

### ULTRAVIOLET

# Suggested U-V Accessories

### FOR THE EAR, NOSE AND THROAT SPECIALIST

1—J6025 Victor Adapter 1—J6030 Tonsil Applicator with Quartz	1—J6154 Nasal Applicator, all metal 1—J6029 Victor Adjustable Holder
Lens	1—J6116 Quartz Pencil Applicator
1—J6106 Wagner Prism, small	1—J6117 Quartz Rod Applicator, 23/4 x 1/4"
1—16107 Wagner Prism, medium	1—J6119 Quartz Nasal Applicator
1—J6108 Wagner Prism, large	1—J6120 Quartz Rod Applicator
1—J6114 Junior Throat Applicator	1—J6122 Quartz Laryngeal Applicator
1—16026 Victor ½" Localizer	1—A3096 Interval Timer
1—[6027 Victor 3/4" Localizer	1—J6202 U-V Tolerance Gauge
1—J6028 Victor 1" Localizer	2—J6001 Ultraviolet Protective Goggles

Price, Complete, \$262.65

### FOR THE DERMATOLOGIST

1—16128 Large Quartz Lens	1—J6029 Victor Adjustable Holder
1—J6098 Holder for J6128 Quartz Lens	1—J6116 Quartz Pencil Applicator
1—J6025 Victor Adapter	1—J6117 Quartz Rod Applicator, 23/4x1/4"
1—J6113 Quartz Lens (Convex)	1—J6202 U-V Tolerance Gauge
1—]6026 Victor ½" Localizer	2—J6110 Ultraviolet Protective Goggles
1—]6027 Victor ¾" Localizer	1—A3096 Interval Timer
1—I6028 Victor 1" Localizer	

Price, Complete, \$102.15

### FOR THE G-U SPECIALIST

1—J6025 Victor Adapter 1—J6026 Victor ½" Localizer 1—J6027 Victor ¾" Localizer	1—J6029 Victor Adjustable Holder 1—J6118 Quartz Rod Applicator 1—J6125 Quartz Speculum—Vaginal
1—J6028 Victor 1" Localizer	1—J6126 Quartz Speculum—Rectal
1—J6115 Prostatic Applicator	1—A3096 Interval Timer
1—16157 Rectal or Vaginal Applicator	

Price, Complete, \$123.15

### FOR THE GYNECOLOGIST

1—J6026 Victor ½" Localizer 1— 1—J6027 Victor ¾" Localizer 1— 1—J6028 Victor 1" Localizer 1— 1—J6115 Prostatic Applicator 2—	-J6029 Victor Adjustable Holder -J6125 Quartz Speculum—Vaginal -J6126 Quartz Speculum—Rectal -J6202 U-V Tolerance Gauge -J6001 Ultraviolet Protective Goggles
1—J6157 Rectal or Vaginal Applicator 1—	-A3096 Interval Timer

Price, Complete, \$103.65

### FOR THE DENTIST

1—J6025 Victor Adapter	1—J6263 No. 1 Gingival Localizer
1—J6026 Victor ½" Localizer	1—J6264 No. 2 Gingival Localizer
1—J6029 Victor Adjustable Holder	1—J6123 Quartz Rod Applicator, curved
1—J6116 Quartz Pencil Applicator	1—A3096 Interval Timer
Jesse Comment of the	2

Price, Complete, \$70.00

### FOR THE HOSPITAL

1—J6025 Victor Adapter 1—J6113 Quartz Lens (Convex) 1—J6030 Tonsil Applicator with Quart Lens	1—J6029 Victor Adjustable Holder 1—J6116 Quartz Pencil Applicator z 1—J6117 Quartz Rod Applicator, 2¾x¼″ 1—J6119 Quartz Nasal Applicator
1-J6107 Wagner Prism, medium	1—J6202 U-V Tolerance Gauge
1—J6026 Victor ½" Localizer	2—J6001 Ultraviolet Protective Goggles
1—J6027 Victor ¾" Localizer	1—A3096 Interval Timer
1—16028 Victor 1" Localizer	

Price, Complete, \$146.65

# Applicators and Accessories for Victor Quartz Lamps



Large Quartz Lens (Convex Face),  $1\frac{3}{8}$ "x $1\frac{3}{16}$ ". This applicator has the largest area of any listed and is used either with or without compression. Satisfactory results have been reported using this lens in the treatment of keloids, naevi, abscesses, boils, port wine marks, adenoma, etc.

Cat. No. J6128\_\_\_\_\_\$21.50



Quartz Lens (convex Face) 11/8" diameter. This lens has a somewhat smaller area than the J6128 and is used for much the same treatments.

Cat. No. J6113 \$20.50



Tonsil or Pharyngeal Applicators,  $6\frac{1}{2}$ " long, with Quartz Lens. Designed for applications of ultraviolet light in the throat.

Cat. No. J6030 \$16.00



Holder for J6128 Large Quartz Lens.

Cat. No. J6098 ......\$6.00



Victor Adapter. Required for all applicators (excepting quartz rods and large quartz lens).

Cat. No. J6025 \$7.00



Nasal Applicator. All metal — designed by Dr. G. C. Wagner of Tacoma, Wash., for the effective irradiation of nasal mucosa. This instrument is furnished complete with adapter to fit Victor lamps.

Cat. No. J6154 \$10.50

Physical Measures in Dermatology. Wm. D. McFee, M. D., Haverhill, Mass., International Jour. of Medicine and Surgery, July, 1927. Page 269.

This paper gives many general suggestions on the technique of treating skin diseases. "In the treatment of boils and carbuncles," it is emphasized, "that if seen early before suppuration has occurred, further development is checked by the prompt use of the Water Cooled Ultraviolet Applicator, pressed firmly against the lesion. After suppuration has occurred, all pus should be evacuated and the indurated base and margins lightly desiccated, after which ultraviolet application should follow."

### ULTRAVIOLET



Technique for Tonsil Application.

Credit for the design of all prismatic ultraviolet applicators belongs to Dr. G. C. Wagner of Tacoma, Wash.

The popularity of Wagner prisms is due to their proven superiority in affording each localization where right angle radiation is required, as in the cases of lateral surfaces.



Wagner Prism, small (nose-throat-dental).

Cat. No. J6106 \_\_\_\_\_\_S32.00



Wagner Prism, medium (tonsil). Cat. No. J6107 \_\_\_\_\_\_\_\$32.00



Wagner Prism, large (G. U. and rectal).

Cat. No. J6108 \$32.00



Junior Size Throat Applicator designed for the purpose of localizing ultraviolet radiation in the throats of children.

Cat. No. J6114 \$10.00



Victor ½" Localizer, 2" long. Cat. No. 16026 \$1.75



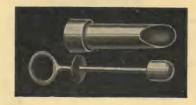
Victor 3/4" Localizer, 2" long.

Cat. No. J6027 \$1.75



Victor 1" Localizer, 2" long.

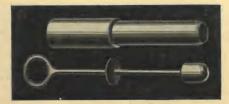
Cat. No. J6023 \$.90



Prostatic Applicator. A metal obturated speculum of convenient dimension to insure an efficient distribution of ultraviolet energy over the prostatic region when introduced rectally.

Cat. No. J6115 \_\_\_\_\_\_\$8,00

### ULTRAVIOLET



Rectal or Vaginal Applicator. A metal speculum, with obturator which may be removed after introduction to permit irradiation. This instrument is used in connection with our holder 16025.

Cat. No. J6157 .....\$6.00



Quartz Speculum-Vaginal. Designed by Dr. G. C. Wagner of Tacoma, Wash., for use both as an aid to diagnosis and for the application of ultraviolet light in vaginal cases. Being made of pure rock crystal (quartz) it is transparent to ultraviolet. With the speculum in situ, the physician may use any of the proper applicators to direct the rays within the speculum to the particular area requiring exposures. The tissues being under compression are rendered anaemic; which makes for better penetration and more efficient bactericidal action.

Cat. No. J6125 \_\_\_\_\_\$36.00



Quartz Speculum-Rectal, same as the above but intended specially for rectal work. This instrument will be found of marked value in the observation of treatment progress in hemorrhoids while under ultraviolet irradiations. It is often used in the treatment of prostatic cases.

Cat. No. J6126 \_\_\_\_\_\_\$24.00



Victor Adjustable Holder. For use with any of the quartz rods listed herein.

Cat. No. J6029 \_\_\_\_\_\_\$8



Rhinitis, corya or hay fever technique.

Hypertrophied Turbinates, Ozaena, Athrophic Rhinitis: "Much may be done in these affections with the ultraviolet ray. All scabs or crust should be first removed to allow the rays free access to the diseased tissues. The cavities should be well cleaned. The water-cooled lamp is used with the short quartz rod inserted into the nasal cavity. A third degree erythema dose, usually about two minutes, is given and repeated every other day should the tolerance of the mucous membrane permit. The more of the mucous membrane that is treated the quicker will the result be obtained."

"Artificial Sunlight and Its Therapeutic Uses," by Francis Howard Humphris.



Quartz Nasal Applicator, 6½" long with flat sides. Some of the radiation is emitted back of the tip although most of it comes out the end.

Cat. No. 16119 \$24.00



Quartz Rod Applicator, 23/4"x1/4", with blunt point. For nasal irradiations in rhinitis, hypertrophied turbinates, ozena, hay fever and similar conditions. Used also for localization in acne pustules, verrucae and angiomata.

Cat. No. J6117 Quartz Rod Applicator, 23/4"x1/4"...\$12.00



Treatment of otitis media.

"In diseases of the ear, with foul purulent discharge (in one case after operation), very good results have been obtained from the water-cooled lamp, using a quartz applicator inserted through an aural speculum into the canal as far as possible up to the tympanum. A second degree ery-thema dose was given. The air-cooled lamp was applied over the mastoid cells at the same time."

"Artificial Sunlight and Its Therapeutic Uses," by Francis Howard Humphris.



Quartz Pencil Applicator, 23/4"x1/8" with olivary tip. An excellent applicator for use in the treatment of corneal ulcers, irradiations of small sinus tracts, auditory meatus, and for the stimulation of granulations in post operative wounds. More especially post operative mastoids with chronic discharge.

Cat. No. J6116 Quartz Pencil Applicator, 23/4" x1/8"...\$12.50



Quartz Rod Applicator, 63/4"x1/4". An olivary tip quartz rod used for urethral application.

Cat. No. J6118 .....

\$24.00



Quartz Rod Applicator. This applicator is designed for radiation of post pharyngeal passages. Its angle is such as to insure maximum utility. It is slightly flattened at the end to offer an oval rather than round ultraviolet beam.

Cat. No. J6120 \$26.00



Quartz Laryngeal Applicator, 6½" long with right angle curve and so constructed that the light emission takes place almost entirely at the tip. Useful particularly in the treatment of laryngeal tuberculosis.

Cat. No. J6122 \$26,00



Quartz Rod Applicator with tip curved at an angle of 120 degrees. Cat. No. 16123



Quartz Rod Applicator with tip curved at an angle of 45 degrees.

Cat. No. J6121 \$23.00

### ULTRAVIOLET



Dental Applicator Full Curved. Useful in connection with the treatment of apical infections, pyorrhoea, and other infections of the dental structures.

Cat. No. J6124 \_\_\_\_\_\$24,00



Pyorrhoea Treatment



Victor Selective Filter. Serves the purpose of absorbing both the lower visible light and the shorter ultraviolet rays, letting through only the long wave ultraviolet. The result is that with its use longer exposures can be given without danger of noticeable skin reactions. It can be applied in deep penetration work for mastoids and frontal sinuses as well as in other cases of the same type. This filter can be attached to the water-cooled lamp and may be used in connection with other instruments listed above. Its limit of ultraviolet transmission is 2967 Angstrom units. Each filter is spectroscopically tested and only those are selected in which the ultraviolet transmission is known to reach 2967 Angstrom units.

Cat. No. J6127 \_\_\_\_\_\$6.00

# Victor Gingival Localizers



These are localizers of the type developed by Dr. Frederick W. Lake of Boston. Dr. J. R. Blayney, University of Illinois College of Dentistry furnished valuable suggestions as to the shape and size best adapted to the average patient.

The use of the No. 1 Localizer permits, in two exposures, the irradiation of the entire labial and buccal surfaces of the maxilla and mandibule.

The localizer closely fits the curve of the jaw protecting the lips and cheeks. The No. 1 Instrument is equipped with handle so that patient can hold it in place.

The No. 2 Localizer is primarily for treatment of the gingival areas from lingual aspect. It may also be used for the irradiation of small areas on either the labial or buccal surfaces where it is not desired to cover as large an area as does the No. 1 Localizer.

 Cat. No. J6263
 No. 1 Gingival Localizer
 \$7.00

 Cat. No. J6264
 No. 2 Gingival Localizer
 6.00

### ULTRAVIOLET

Wood's Filter. This is the special dark glass filter that is used to produce various interesting optical effects with pure ultraviolet energy exclusive of visible light radiation.



Wood's Filter, unmounted, 17/8" diameter.

Cat. No. J6109 \_\_\_\_\_\$7.50



Wood's Filter, mounted to fit Victor Water-Cooled Lamp.

Cat. No. J6190 \$11.25

The Detection of Ringworm Hairs on the Scalp by their Fluorescence Under Ultraviolet Light. A. C. Roxburgh, British Journal Dermatology, August-September, 1927.

Abst. Am. J. Dis. Child. (February, 1928). Page 332.

"This method consists of examining the head in a darkened room by the light from a mercury vapor or tungsten arc lamp passed through a piece of Wood's glass. Wood's glass is dark violet and contains oxide of nickel. It allows only a little red and visible violet and some long ultraviolet rays to pass.

"Normal hair and skin show slight fluorescence under this light, the finger nails react more brightly but hairs infected with ringworm give a brilliant fluorescence with a greenish light.

"This enables one easily to identify small groups of infected hairs or even single stumps on an otherwise healthy scalp. The appearance becomes pathognomonic only when the hairs are infected.

"The author finds the method of value in ascertaining whether epilation after thallium acetate or roentgen ray treatment is complete, or whether a few ringworm stumps still remain; it is also of value in deciding whether the brother or sister of a patient with ringworm is infected."

# Victor Operator's Goggles



Lighter in weight by far than similar devices, these goggles may be worn for hours without discomfort. They are easily put on and adjusted and are of a shape and size that will fit over the operator's regular spectacles.

The Victor Operator's Goggles are made of the slow-burning colored transparent sheeting (not the ordinary celluloid). They accurately fit the face—preventing white light reaching the eyes.

To operators of quartz lamp equipment the Victor Operator's Goggles serve ideally as a safeguard against long, continued or repeated exposure to powerful ultraviolet radiation.

Cat. No. A3962 Victor Operator's Goggles .....

.\$2.50

# Ultraviolet Protective Goggles



These consist of a pair of smoked glass lenses mounted in metal framework, equipped with ventilated shields and adjustable ear-bows.

They are easily cleaned, light and comfortable, and may be sterilized in the usual manner whenever necessary.

Cat No. J6001 \$1.00

### Carbon Tetrachloride

Used for cleaning applicators and burners to obtain maximum amount of radiation. Commercial grades of carbon tetrachloride are not always satisfactory because they may leave a film which impairs the efficiency of the apparatus.

Cat. No. J6205 Victor Carbon Tetrachloride, 2 oz. S0.30
Cat. No. J6206 Victor Carbon Tetrachloride, 1 pint .95

# Adapter Plate

This device affords a means for using the various holders with applicators on the Victor Air-Cooled Lamps.

Cat. No. J6039 Adapter Plate only for Air Cooled Casing...\$12.50 Cat. No. V2739 Weight to compensate for Adapter Plate... 2.25



Shows adapter plate mounted in air-cooled hood.



### Tungar Bulb

# Mica Screen

Consists of standard holder with mica screen which cuts off U-V Radiation but passes light rays.

Cat. No. J6038 Mica Screen \$3.75



# U-V Tolerance Gauge

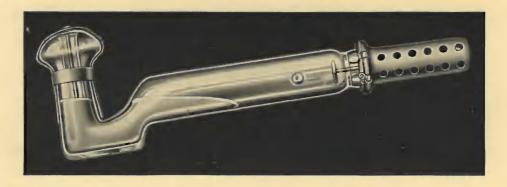


For determining individual tolerance without discomfort to the patient and regardless of the type of lamp used. The gauge consists of a metal plate with protective skirt. The plate has twelve  $\frac{3}{16}$ " apertures equipped with separate sliding covers marked from 10 to 120. Starting with the first hole marked 10 additional holes are uncovered at intervals of 10 seconds. A series of successive exposures is thereby obtained, each being greater than the one preceding it by the same number of seconds (10 or more as desired). From the appearance, the following day, of the various small areas of skin the physician may decide as to the type of treatment to be administered.

Cat. No. J6202 U-V Tolerance Gauge

\$2.50

### Extra Quartz Tubes



Air-Cooled Type "Uviarc" Quartz Tube.

# VICTOR THERMOSPECTRAL LAMPS FOR INFRA-RED AND LUMINOUS RAYS



### REFERENCES

"\*\*\* applied wherever there exists pain \*\*\* or where finer tissue exudates or constrictions exist." Byron Sprague Price, M. D., American Journal Electrotherapeutics and Radiology, August, 1922.

"\*\*\* useful therapeutically principally in the relief of pain in such conditions as neuritis, neuralgia, sciatica, intercostal neuralgia, occipital neuralgia." Jean Saidman, M. D. (Paris), American Journal Physical Therapy, February, 1928.

"\*\*\* able to produce the inciting effect of fever upon, for instance, the oxidation and the formation of anti-bodies without producing the harmful effects of fever upon the organism.

"\*\*\* Metabolic Function—Hemoglobin gives off its oxygen more readily under the influence of light, hence phototherapy, which floods the tissues of the body with this agent, increases the oxidizing power of the blood and is assumed to accelerate oxidation throughout the body." Carl Sonne, Acta Medica Scandinavica.

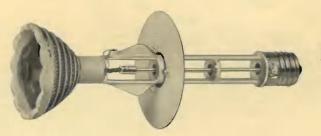
# Victor Thermospectral Lamps for Radiant Heat Therapy

Duplex Outfits Using the Incandescent Bulb and Infra-Red Unit Interchangeably

Just as a correct drug prescription requires a knowledge of the action of the drugs prescribed, so does the intelligent use of any physical therapeutic energy require a knowledge of the nature of that energy. Eminent physicists deplore the fact that more accurate data have not been given in many investigations, especially pertaining to the wave-lengths of radiant energy employed, and the too frequent use of indefinite terms in describing results. In other words, reported clinical results with radiant energies are distinctly valuable only when the spectral limits and the spectral distributions of the energy employed have been definitely determined.

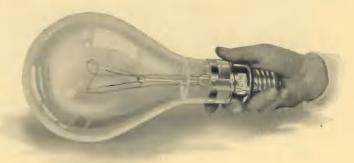
It is on this basis that Victor Thermospectral Lamps are presented. Each lamp (either Model "A" or "B") is virtually two outfits in one, in that the incandescent bulb and infra-red unit may be used interchangeably. The spectral ranges of the two energies derived are as follows:

	Spectral Range (Angstrom Units)	Dominant in Region of (Angstrom Units)
Incandescent Bulb	4000A— 25000A	9000A—11000A
Infra-Red Unit	7600A—150000A	20000A-30000A



Infra-Red Unit as used interchangeably with Incandescent Bulb in Model "A" Thermospectral Lamp.

Incandescent Bulb (Nitrogen filled) as used interchangeably with Infra-Red Unit in Model "A" Thermospectral Lamp.





# Victor Thermospectral Lamp, Model "A"

On Counterweighted Stand.

This model has a double reflector to facilitate ventilation.

The white enameled inner jacket of the reflector is fluted, with the result that a great proportion of the rays will be directed downward through the opening of the reflector to the patient.

The elbow through which the adjustments are made provides for any desired angle of the hood, according to the position of treatment.

Vertical adjustment of the reflecting hood is supplied by means of a counterweight in the tubular upright of the floor stand.

The curved arm holding the reflecting hood moves over two sets of roller bearings when it is desired to extend the hood horizontally.

Cat. No. J6096 Victor Thermospectral Lamp, Model "A," mounted on floor stand with counter-weight for reflecting hood; not including infra-red unit or nitrogen bulb. Shipping weight, 124 lbs......\$150.00

See page 67 for listing of accessories.



# Victor Thermospectral Lamp, Model "A"

On Telescopic Stand.

Another model in the floor stand type as shown above. It is more simple in design, for the sake of economy, yet practical and efficient.

The extreme height from the floor to the rim of the reflecting hood when placed perpendicularly is 64 inches. The range of the vertical adjustment is 36 inches and is obtained by the use of a telescopic tube column and set screw.

The substantial tripod base of the floor stand is mounted on easy rolling casters.

Cat. No. J5994 Victor Thermospectral Lamp, Model "A," mounted on telescopic floor stand, not including infra-red unit or nitrogen bulb. Shipping weight, 87 lbs. \_\_\_\_\_\_\$132.00

See page 67 for listing of accessories.



# Victor Thermospectral Lamp, Model "A"

On Wall Bracket.

Where floor space is limited the wall bracket installation is available, as shown herewith. By means of the counterweight, the lamp can be quickly raised and lowered, the suspension cable moving freely over two pulley wheels. The angular adjustment of the hood is made through the friction joint immediately above the apex.

A telescopic arrangement of the horizontal bar permits extension of the hood from the wall over a range of 32 to 50 inches. This feature in combination with the friction joint for angular adjustment makes the Victor wall bracket outfit distinctly practical.

Cat. No. J5993 Victor Thermospectral Lamp, Model "A," with wall bracket instead of floor stand, not including infra-red unit or nitrogen bulb. Shipping weight, 71 lbs. \$127.00

# Accessories for Model "A" Thermospectral Lamp

Cat. No. J6193	Infra-Red Unit, 1000-watt, for 105-118 volts, complete with adapter, for Model "A" Thermospectral Lamp	315.25
Cat. No. J5980	Nitrogen Bulb, 1500-watt, for 115-volts	8.10
Cat. No. J5982	Nitrogen Bulb, 1500-watt, for 125-volts	8.10
Cat. No. J5984	Nitrogen Bulb, 1000-watt, for 115-volts	6.00
Cat. No. J5985	Nitrogen Bulb, 1000-watt, for 125-volts	6.00
Cat. No. J5978	Nitrogen Bulb, 1000-watt, for 220-volts	7.00
	Protective Pyrex Shield for hood opening of Model "A" Thermospectral Lamp, complete with mounting clamps	

### THERMOSPECTRAL LAMPS



# Victor Thermospectral Lamp Model "B"

Like the Model "A" lamp, the Model "B" may be used with an incandescent bulb or infra-red unit as desired. Being of smaller dimensions it, of course, operates with smaller units, which are illustrated on the opposite page (Fig. 2).

In Figure 4 and in the illustration above, the Model "B" lamp is shown as it appears when used with its floor stand. Figure 1 shows it as used without stand. Note the convenience of the toggle switch inserted in the cable.

The stand used with this lamp is shown in Figure 3. It is supplied with a flexible extension arm which may be bent at any angle, retaining whatever position it is given for the convenience of various treatments. The base is of sufficient weight to keep the complete unit in position no matter at what angle the lamp may be set.

The extension arm is mounted on a sliding vertical rod which extends to almost double the length of the supporting tube, giving an overall extension of approximately seven feet. This is considerably more than required, but it allows ample leeway for ordinary adjustments.

The lamp hood is of aluminum, highly polished inside and enameled a semi-

### THERMOSPECTRAL LAMPS

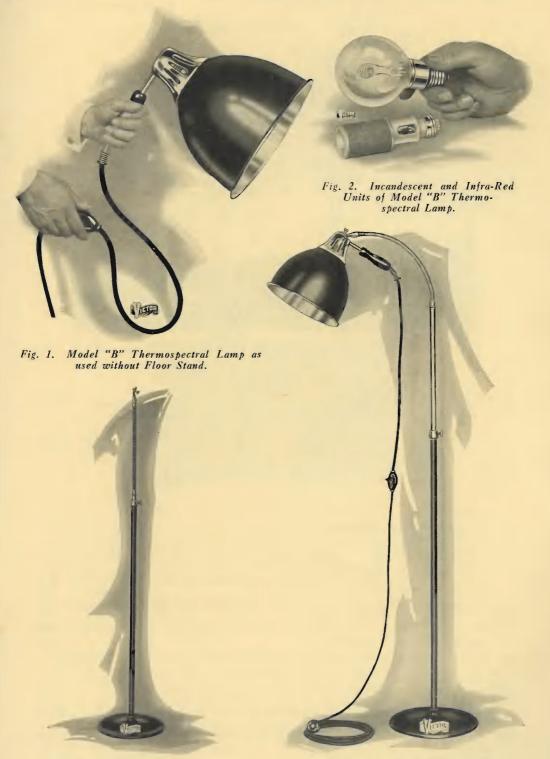


Fig. 3. Floor Stand for Model
"B" Thermospectral
Lamp.

Fig. 4. Model "B" Thermospectral Lamp mounted on Floor Stand.

### THERMOSPECTRAL LAMPS



Two lamps may be used for treating large areas or two different parts of the body.

dull black on the outside. The base and upright column are finished in glossy black. The sliding rod and extension arm are nickel-plated.

At the apex of the extension arm there is a permanent thumb screw which attaches to the lamp hood, as shown in Figure 4. The hood may be detached in a few seconds.

### **SPECIFICATIONS**

Cat.	No.	J6197	Victor Thermospectral Lamp, Model "B," as shown in Fig. 1, i. e., less Floor Stand, Infra-Red Unit and Incandescent Bulb. Approximate shipping weight, 21 lbs	\$19.00
Cat.	No.	J6198	Floor Stand for above, as illustrated in Fig. 3. Approximate shipping weight, 20 lbs.	17.00
Cat.	No.	J6201	Infra-Red Unit, 630 watt, for Model "B" Thermospectral Lamp; range, 105-125 volts	2.25
Cat.	No.	J6242	Same, for 220 volts	2.75
Cat.	No.	J5014	Incandescent Bulb, 200 watt, for Model "B" Thermospectral Lamp,	
			for 110 volts	1.25
Cat.	No.	J5828	Same, for 220 volts	2.00
			Outfit complete, as listed above, for 110 volts	39.50
			Outfit complete, as listed above, for 220 volts	40.75

# Mobile Extremity Baker



Local exposure to heat causes an increased circulation in the part, an actual but limited rise in temperature of superficial structures such as the skin, tendons and fibrous tissue, relaxation of tissue (especially of the muscles), a hyperemia probably due to dilatation of blood vessels, local sweating and in general the conditioning of the tissues so that they will benefit more than they otherwise would by measures such as massage, passive and active motion.

"The application of external heat locally to a joint or joints in arthritis is often of the highest value. \* \* \* The value of the heat can sometimes be enchanced by incorporating with it some other principle, as in the use of a hot saturated solution of magnesium sulphate applied to the affected part and kept hot \* \* \* this procedure sometimes greatly relieves pain."

In regard to organic nervous diseases:

"Heat is of the greatest value in inflammations of the peripheral nerves and in vascular diseases in which the nervous system is implicated. In the various neuritides, such as intercostal neuralgia or inflammation of any of the nerves in the limbs, heat, and particularly dry heat, allays the inflammation. In intercostal neuralgia, care must be taken to give a sufficient amount of treatment, for the penetration here must be deeper than in the limbs. \* \* \* In certain vascular diseases of the limbs, such as erythromelalgia, Raynaud's disease, thrombo-angitis obliterans, thrombophlebitis and endarteritis obliterans, dry heat applied to the diseased parts more or less constantly over a period of days may cause an alleviation of the symptoms. \* \* \* Even in chronic diseases of the nervous system, such as hemiplegia or lateral sclerosis, when the limbs are spastic, heat will decrease the spasm and contractures, at least for a time, and will moderate other symptoms."

After the inflammatory reaction resulting from an injury subsides:

"The succeeding subacute and chronic stages with swelling, sluggishness, anemia and lowering of metabolism are to be treated by the application of heat, massage, and passive and active motion carried out in a manner to avoid repetition of traumatism of the structures already injured.

"Fractures. \* \* \* Fractures into or about the joints, such as Colles' fracture or Pott's fracture, accompanied by swelling at the site of the fracture and particularly by swelling of the hand or foot, are best treated by baking followed by massage. This treatment should be begun within a few days after reduction of the fracture.

"Sprains and Dislocations. \* \* \* On the whole, fixation by a removable plaster splint and daily baking and massage are to be preferred to strapping with adhesive plaster, which does not permit of physical therapy.

"Traumatic Synovitis. \* \* \* During this stage (the secondary stage of absorption of effusion and restoration of function of the joint begins), baking and massage are vitally important in aiding these processes.

"Contusions and Muscle Sprains. \* \* \* Similar means of treatment are valuable also in these conditions to secure absorption of the products of hemorrhage, to eliminate swelling and pain, and to secure restoration of function. Collections of blood, if not absorbed, may form cysts or may be infected through the blood stream and become abscesses. The development of such abscesses after local injury is not uncommon. "Bursitis. This condition, often seen about the elbow and shoulder joints, for example, and resulting from acute or chronic strain, is susceptible to improvement or cure by baking and massage."

The above comments are based on, and the quotations made from, an article approved by the Council on Physical Therapy of the American Medical Assocation entitled "The Influence and Therapeutic Use of External Heat", by Pemberton et al, October 8, 1927 issue Journal A. M. A.

Due to the counterbalancing arrangement the Mobile Extremity Baker may be easily adjusted to give the proper height for arm, leg, shoulder, chest, back or side treatments or the Baker may be removed from the stand for use on a table or bed as is sometimes required in work on fractures and orthopoedic cases. In addition to the two end covers an extension cover is provided for treatments to the shoulder, chest, back or sides of the body.

For control, the guarded thermometer in the top is used in conjunction with the three point switch. On high heat the unit takes about 750 watts.



Adjustable to various heights, locations, positions and temperatures.

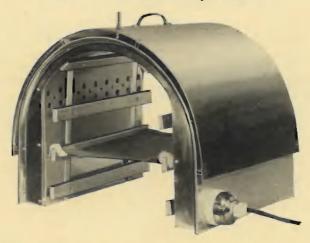
The special heating units produce continuous circulation of air with no hot spots and with a minimum tendency to blister or burn. The prespiration is quickly absorbed by the circulating air, and heat of comparatively high degree can be aplied.

All metal parts inside the Baker are thermally insulated with wood guards and the construction throughout is rugged, yet comparatively light in weight due to the use of aluminum for many of the parts.

Cat. No. J6231 Mobile Extremity
Baker for 110
volts A. C. or
D. C. \$100.00

Bakers for other voltages furnished on order.

### Portable Extremity Baker



When used on a table or bed this Baker is very convenient for treating extremity conditions as mentioned in the description of the Mobile Extremity Baker.

It is also satisfactory for maintaining boric acid dressings at a uniform temperature day and night while at the same time greatly retarding evaporation. For example, the "low" heat will hold the temperature of the dressing between 140 and 160 degrees F. and since the air is continually recirculated due to the design of the Baker, moisture evaporation from the dressing will be greatly reduced. The unit is equipped with fabric cover which incloses the ends, thermometer and three heat switch. On "high" heat the Baker takes approximately 300 watts.

Cat. No. J6232 Portable Extremity Baker .....

\$40.00

# Portable Body Baker

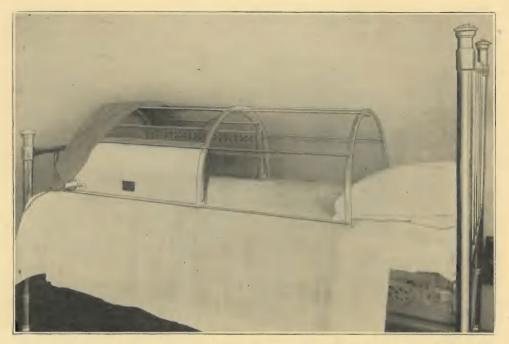
"One of the earliest effects to be noted after systemic exposure to heat is that on the circulation. \* \* \* Systemic exposure to heat in any form results, \* \* \* in a loss of fluid from the body through the lungs and sweat and, following baths, through the urine also. \* \* \* The elimination of these substances (contained in sweat), especially water, salt and urea, forms the basis of the use of the sweat process in various forms of nephritis accompanied by edema or high blood urea nitrogen. There is a large clinical support for belief in the value of this measure in nephritis, in which its influence is undoubted as regards salt and water. \* \* \* One of the most fundamental effects of exposure to heat appears to depend somewhat on the increased loss of carbon dioxide through these three channels (urine, sweat and lungs), \* \* \* the general body metabolism is increased. \* \* \*

"Systemic effects find their application for the most part in medical, as contrasted with surgical, conditions, and are valuable chiefly in the following disease states or syndromes: nephritis, acute or chronic; arthritis and rheumatoid conditions, in which either local or systemic heat or both may be used; and neurologic conditions including neurasthenia, functional psychic disturbances and the true insanities. \* \* \*

"Nephritis. There is probably no other condition in which the systemic use of external heat may have such specific early consequences as in nephritis. Whatever other pathologic manifestations may accompany nephritis, those which most imperatively demand treatment are dependent on the retention of toxic material, presumably of a nitrogenous nature, salt or water. \* \* \*

"ARTHRITIS AND RHEUMATOID CONDITIONS. The field in which the application of external heat, both systematically and locally, has its most extensive and varied application is probably that of arthritis and rheumatoid conditions. \* \* \*

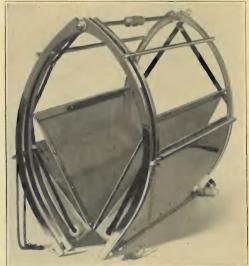
### BAKERS



"In the psychoneuroses the so-called tonic electric bakes, given every day and followed by hot and cold contrast showers, afford a great stimulus to the patient."

The above comments are based on, and the quotations made from, an article approved by the Council on Physical Therapy of the American Medical Association entitled "The Influence and Therapeutic Use of External Heat", by Pemberton, et al. October 8, 1927 issue Journal A. M. A.

The Portable Body Baker is preferred by many over the usual type of bath cabinet because it may be used for all cases where this form of treatment is indicated, including those where it is desirable to have the patient remain in bed.



Closed view of Portable Body Baker ready to be stored or carried.

### BAKERS

The extension feature—length may be varied from 32 to 62 inches—makes possible the treatment of part or all of the body of children or adults.

The closely woven fabric cover fits snugly over the entire cabinet to retain the heat within the inclosure. The degree of heat can be easily and conveniently controlled by means of a three heat switch located on the side of the cabinet while the thermometer indicates the temperature within. The heating units are remotely located within the frame so that accidental contact with the patient is impossible, while the air carries heat from the resistance wire to the patient giving a pleasant and effective treatment.

The maximum power required for "high" heat is approximately 750 watts. The dimensions of the cabinet when opened and fully extended are: length, 62 inches; width, 32 inches; height, 19 inches.

Cat. No. J6233 Portable Body Baker for 110 A. C. or D. C. \$125.00 Bakers for other voltages furnished on order.

### Electric Infant Incubator



A portable electrically heated incubator with automatic, adjustable temperature regulator which can be set to hold the temperature at any point between 80 and 100 degrees F. An indicator lamp shows whether the current is on or off and the thermometer gives an accurate indication of the temperature.

The heating units are enclosed in the housing and are accessible only to the air which continually recirculates in the incubator. The front is equipped with a special fabric which is easily removed for washing and sterilization. Two sets of cloths are furnished with each incubator.

The unit may be connected to the usual lighting socket and costs no more to operate than a 60-watt lamp. Weighs only 7 pounds.

Cat. No. J6234 Electric Infant Incubator ......

.\$80.00

### Victor Comfort Heat Pad

For the Application of Heat Wherever This Form of Thermotherapy is Indicated



This Comfort Pad equipped with a white rubberized jacket is especially desirable for hospital use because it is easy to keep it clean. The waterproof covering prevents the pad from absorbing perspiration and other body fluids. This jacket is removable. It is held in place by snap fasteners.

The pad is made of soft flexible material with an eiderdown wool covering. It will follow gently every curve of the body. It offers a most convenient means of applying heat at the exact spot needed. It will supply its soothing heat steadily for hours at a time.

A wide range of temperatures is available—controlled by a three-heat feed through switch. Two safety thermostats limit the temperature. All pads are tested for temperature adjustment and to insure against radio interference.

Cat. No. J6268 Victor Comfort Heat Pad, 12"x15" 3-Point Heat Control, 60 Watt—

110 Volt with Rubberized Jacket \$9.25

# Treatment Tables Muscle Training Apparatus Hydrotherapy Equipment

IN PERIPHERAL nerve injuries, post operative conditions, fractures, etc., passive-active and active movement so conveniently obtained with the muscle training apparatus shown in this section are real aids in bringing back and strengthening voluntary movement, improving nutrition and restoring the joint in minimum time to full usefulness.

The treatment tables not only add to the appearance of the treatment room but also increase the operator's efficiency and the patient's comfort.

There are conditions such as painful stumps and scar tissue, partial paralysis and nerve injuries which react more favorably to treatment in the whirlpool bath than to any other form of therapy and the Physical Therapy Department is hardly complete without these two very useful equipments—the arm and the leg whirlpool baths.

The muscle training apparatus and whirlpool baths required to meet the minimum standard for the Physical Therapy Department of a General Hospital are shown in this section. The designs are based on the recommendations and experiences of authorities on the subject and meet the specifications laid down by the National Council.

While figures on floor and wall space are given, our Hospital Service Bureau will gladly assist in making layouts which will insure maximum utilization of the available space.

### TREATMENT TABLES

### No. 1 Treatment Table

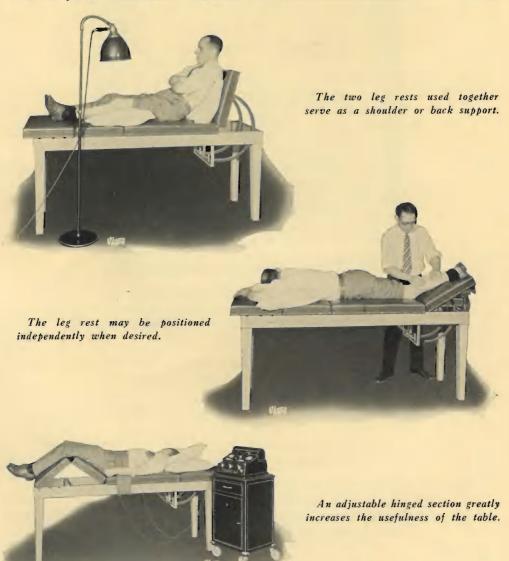
This is a substantially constructed table designed to give all the positions required for physical therapy treatments. In addition to the positions pictured, the table is frequently used for work on the eye or head, in which case the patient is placed so that his head rests in the cutaway part of one of the adjustable foot rests.

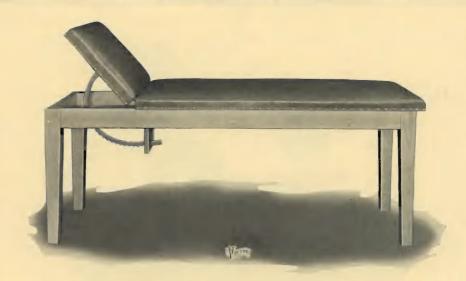
The table is upholstered with a washable leatherette cover which is highly resistant to wear.

Overall dimensions: Length, 79"; width, 24"; height, 32".

Approximate shipping weight, 225 lbs.

Cat. No. J6208 Victor No. 1 Treatment Table \_\_\_\_\_\_\$100.00



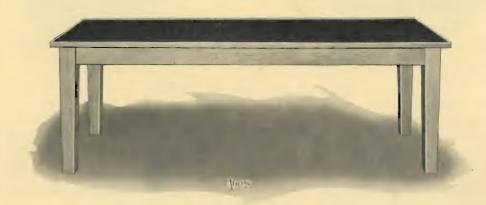


### No. 2 Treatment Table

The adjustable head rest is sufficiently long to serve as a back and shoulder rest when treatment is given in the sitting position. The table is generously proportioned, being 78" long, 31" high and 24" wide.

Approximate shipping weight, 220 lbs.

Cat. No. J6209 Victor No. 2 Treatment Table with upholstered top \_\_\_\_\_\_\$77.00



### Massage and Irradiation Tables

These are plain treatment tables without adjustable rests. They are 78" long and 27" wide. They are covered with a heavy grade of washable linoleum, similar in appearance to the coverings now being used for office desks.

Approximate shipping weight, 180 lbs.

Cat. No. J6211	Victor Massage Table (271/2" high)	
Cat. No. J6243	Victor Irradiation Table (14" high)\$40.00	



### Hand and Wrist Table

This is a substantial table made of hard wood and equipped with two sets of individual finger pulleys with weights, and a pendulum wrist exerciser. A bracket supports six pulleys above the table—four used for flexion of the metacarpophalangeal and interphalangeal joints and two for thumb ad- and abduction. Four of the other set of six pulleys with finger grips on the table are convenient for extension of the metacarpophalangeal and interphalangeal joints. The other two may be used for thumb ad- and abduction. The pendulum device is arranged with an adjustable weight. Dimensions: 30" high, 24" wide, 36" long. Approximate shipping weight, 85 lbs.

Cat. No. J6214 Victor Hand and Wrist Table...

.\$50.00

### MUSCLE TRAINING



# Finger Board

The wooden base, serving as an arm rest, has points which are used for stretching abduction at the metacarpophalangeal joints and for training and coordination of the fingers. A stairway of eight steps is mounted on the base and is used for stretching contraction of the fingers while in flexion. The base covers an area 25"x5!/2". Approximate shipping weight, 10 lbs.

Cat. No. J6213 Victor Finger Board

.\$5,00



### Wrist Circumductor

A metal wheel mounted on a wood base  $(11\frac{1}{2}"x22")$  with rest and straps for wrist and forearm. Provision is made for varying the distance of the handle from the center of the wheel. Approximate shipping weight, 50 lbs.

Cat. No. J6216 Victor Wrist Circumductor .....\$25.00



### Wrist Roll

A revolving, wooden roll mounted on a wall bracket and arranged to provide exercise for the wrist. For extension of the wrist, the roller is revolved counter-clockwise (looking at the right end) using an overhand grasp, while for flexion the grasp is reversed, keeping the same direction of rotation. The three different diameters allow ample flexibility and make the device adaptable to various conditions and degrees of disability. Wall space required for installation, 11½"x36". Approximate shipping weight, 30 lbs.

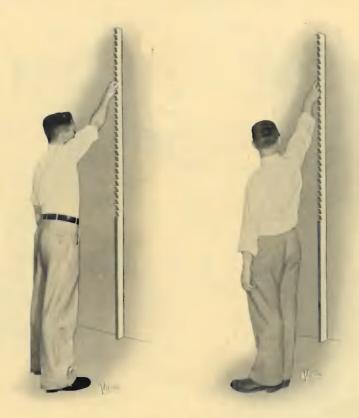
Cat. No. J6215 Victor Wrist Roll \_\_\_\_\_\$15.00

### Ankle Exerciser

Consists of a foot pedal mounted on tempered springs having unequal pressure in order to provide active exercise. The thick leather support takes care of heel pressure and serves to maintain position while the strap holds the footin place. This unit is 18" long by 9" wide. Approximate shipping weight, 10 lbs.

Cat. No. J6224 Victor Ankle Exerciser \$7.00





### Shoulder Ladder

A single wooden bar with thirty-one steps. This is sometimes called a creeping board and is used for assistive abduction of the shoulder muscles. Length overall is 60'', width,  $2\frac{1}{2}''$ . Approximate shipping weight, 25 lbs.

### Pulley Weights

Used for shoulder, elbow and chest exercises. This unit consists of variable counterweights attached through a pulley arrangement to a rope equipped with a handle. The weights are mounted on guide rods of sheradized steel. Approximate shipping weight, boxed, 40 lbs.

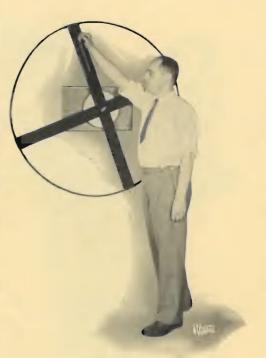
Cat. No. J6220 Victor Single Pulley Weights, with 10 lbs. of weights \_\_\_\_\_\_S19.00

# Shoulder Wheel

This device is intended for the exercising of shoulder, elbow and wrist muscles. It measures 48" in diameter and a corresponding amount of wall space is required. The handle may be adjusted within 10" limits to conform with individual requirements. Any desired degree of friction may be obtained. The wall board is 12"x20" long. Approximate shipping weight, 75 lbs.

Cat. No. J6218 Victor Shoulder Wheel .....

...\$25.00

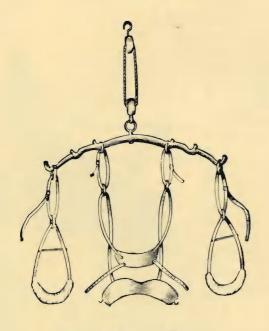




# Stall Bar

A wood frame with rungs of selected, polished maple. The second rung from the bottom is brought forward for a toe grip. The frames or uprights are made of hard pine. The design is such that additional units may be added in continuous order. Dimensions overall, 3' wide by 8' high. Approximate shipping weight, 75 lbs.

Cat. No. J6222 Victor 3'x8' Stall Bar Section, disassembled .....\$27.00



# Sayre Head Sling

A suspension apparatus consisting of a metal brace with leather head and shoulder supports which may be used for traction exercise in spinal curvatures. The sling, which may be suspended from the ceiling, is equipped with compound pulleys. Approximate shipping weight, 5 lbs.





# Foot Inversion Tread

An inverted trough with rachet for surface adjustment providing various degrees of angulation. The floor space required is 70"x12". Approximate shipping weight, 75 lbs.

Cat. No. J6225 Victor Foot Inversion Tread \_\_\_\_\_\$21.00

# Rowing Machine

This machine is equipped with friction clutch which takes hold instantly and retains the pressure until the stroke is completed. On the return stroke the brake is automatically released. The amount of resistance may be easily adjusted by means of the key furnished with each equipment.

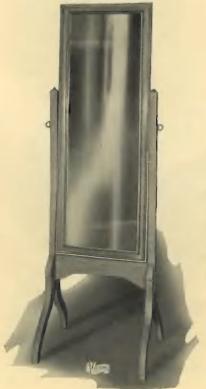
Since a rowing machine brings so many muscles of the body into action it is very satisfactory for general bodily development as well as for the exercise of particular joints and muscles. It is one of the most pleasant of the routine exercises and it is especially recommended for members of the profession who may feel the need of a few minutes general exercise at regular



intervals. Unboxed it is comparatively light and may be used in the home as well as in the office.

Cat. No. J6223 Victor Friction Type Rowing Machine.

\$42.00



# Posture Training Mirror

This mirror is very useful in teaching accuracy and also helps the patient to associate the feeling of the movement with its appearance. Built on the order of a Cheval glass; made of beveled plate, highly silvered and polished. The mirror measures  $47\frac{1}{2}$ " long by 15" wide, supplying ample reflection so that the patient may see himself from head to foot. The overall dimensions are 70"x25". Approximate shipping weight, 100 lbs. A three mirror arrangement can be furnished on special order.

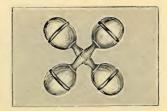
Cat. No. J6212 Victor Posture Training

\$34.00

### **Dumb-Bells**

Made of selected hard maple. Shaped with comfortable grip and oblong bells. Weight, 12 oz. each. Listed and supplied in pairs. Hangers, either mounted or unmounted, can be furnished on special order.

Cat. No. J6217 Pair Victor Dumb-bells \$1.10





# Whirlpool Arm Bath

The Victor Whirlpool Arm Bath is of generous proportions, 26" long, 14" wide and 10" deep. A substantial, but not excessively heavy, four-legged nickel plated stand, supports the bath so that the distance from the floor to the top of the tank is 32".

The tank has a beaded top and polished exterior and is made of that durable corrosion-resistant material—monel metal. It is equipped with the Hutchins-Stanmyre whirlpool spray nozzle.

The drain takes either a  $1\frac{1}{2}$ " tubing waste or, if hose is used, a  $1\frac{1}{2}$ " hose with pipe thread coupling. The connection between the inlet fitting on the nozzle and the mixing valve

is made with a suitable length of ordinary garden hose, obtainable locally. Approximate shipping weight, 90 lbs.

Cat. No. J6226 Victor Whirlpool Arm Bath with Whirlpool Spray Nozzle......\$125.00

"Hot whirlpool baths consist of water at a temperature from 100° to 110°, rapidly agitated \* \* \*. Such whirlpool baths furnish a combination of heat and gentle massage and improve local circulation effectively in conditions of peripheral nerve injuries, indolent ulcers, adherent scars, osteomyelitis of terminal phalanges, as well as in recent fractures immediately after removal of the cast."—Physical Measures in General Practice. By Dr. Richard Kovacs, in New York State Journal of Medicine, August 1, 1928.

# Whirlpool Leg Bath



The Victor whirlpool leg bath is 36" long, 14" wide and 33" deep. The bath is made of monel metal with beaded top and polished exterior. Connection between the nozzle inlet and a mixing valve is made with a suitable length of 3/4" hose.

A Hutchins-Stanmyre whirlpool spray nozzle is furnished with every bath to provide adequate aeration and circulation. A 1½" tubing waste or 1½" hose coupling may be connected to the drain fitting, depending upon whether permanent piping or flexible hose is used for the

drain. The overflow fitting and drain valve are integral parts of the bath.

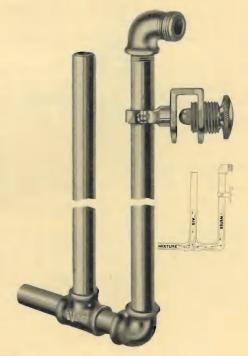
Dr. Harry E. Stewart in his book "Physical Reconstruction and Orthopedics" says:

"For sensitive stumps or masses of scar tissue, treatment by whirling water at 95-110 degrees, mixed or unmixed with air, leads to a very marked reduction of sensitiveness and to active hyperemia, and is an invaluable means of the preparation of the part for massage or exercise."

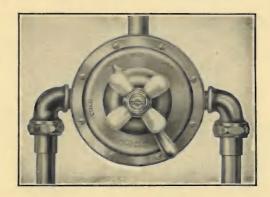
# Whirlpool Nozzles

The Hutchins-Stanmyre Whirlpool Spray Nozzle, an exclusive feature of Victor Whirlpool Baths, is inherently reliable since it is without moving parts, efficient since it obtains thorough aeration using only the force supplied by the stream of water, and convenient because it may be easily positioned either horizontally or vertically to suit the operator.

Cat. No. J6229 For Leg Bath. Overall length, 29" .....\$20.00



# Thermostatic Mixing Valve



The Victor Thermostatic Mixing Valve serves to automatically maintain the proper water temperature. The device may be set for a given temperature and the flow of water will be maintained at this temperature so long as the supply of hot and cold water to the valve is not interrupted. The valve is equipped with a thermometer so that the water temperature may be easily checked. Each bath should have an individual thermostatic mixing valve and the unit just described makes a practical device for this purpose.

# Precision Thermostatic Mixing Valve

This valve serves the same purpose as the A3504 mentioned above, the difference being that it has a wider range of adjustment and is subject to more accurate manipulation. As will be seen from the photograph, it has a temperature scale marked on the valve below the adjustment handle for temperatures from 80 to 120 degrees F. (For developing tank service the valve can be furnished with temperature marking from 40 to 120 degrees F.) The valve has a capacity of fifteen gallons per minute at a line pressure of forty pounds. The unit is furnished with combination check valves and strainers, \( \frac{1}{2} \) hot and cold water inlet connections and \( \frac{3}{4} \) bottom back outlet connection for exposed piping and is intended for mounting in a vertical position. Hot water should be piped to the left hand side and cold water to the right.

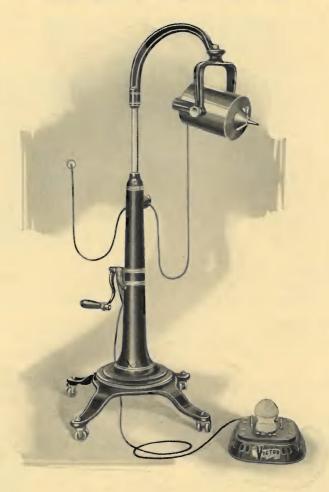
If the cold water supply to the mixing valve suddenly fails, it will automatically, through its thermostatic action, shut off the hot supply from the valve, therefore, it is anti-scalding. It is also anti-chilling as the reverse action would take place if the hot water supply suddenly failed.



Cat. No. J6237 Precision Thermostatic Mixing Valve as described (Wall bracket, \$10.00 additional.)

\$125.00

# Victor Giant Magnet on Crane



This is a powerful, easily manipulated and controlled magnet widely used in the detection and extraction of magnetic particles in and from the human body. The following incident will serve to emphasize a use not generally appreciated for this magnet. In the case referred to a small piece of a needle was imbedded in the palm of the hand and was not located even after considerable time had been expended in exploring through a one inch incision. The patient was then taken to a Victor Giant Magnet and with the stitches out, the crank and gear arrangement was operated to cause the magnet tip to gradually approach the patient's hand. The piece of needle suddenly appeared on the tip while the magnet was still over one-half inch from the injured part. This demonstrates the ease of extraction and the fact that additional attractive force was available, since this factor increases rapidly with decrease in distance between the object and the tip of the magnet.

The Victor Giant Magnet can also be used for diagnostic work. Magnetic particles can be very accurately located by the bulging of the tissues over the object or by the sensation of pain experienced by the patient as the magnet is slowly moved over the injured area. Just a momentary approach of the

magnet will often cause enough movement of the foreign object to be visible to the operator or to give the patient sensation or pain.

In the removal of magnetic objects such as iron and steel from the eye, the Victor Magnet has proved of great assistance and since it is of importance to make the removal as early as possible and before the body becomes encysted, the Victor Magnet should be a part of the equipment of those institutions likely to receive such cases.

Many eyes have been saved through prompt use of the Victor Magnet and while few institutions will be called upon to use it frequently, it should be remembered that the saving of vision in one or probably both eyes of a single patient will more than justify, both from an economical and humanitarian standpoint, the investment in a time-tried, case-proven unit such as the Victor Giant Magnet.

References: Foreign Bodies in the Eye, by Dr. J. B. Gray, El Paso, Texas, in January, 1927, issue Southwestern Medicine.

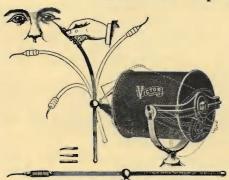
LOCALIZATION OF FOREIGN BODIES IN OR ABOUT THE EYE, by Harlan P. Mills, M. D., and W. Warner Watkins, M. D., Phoenix, Ariz. (Radiology, April, 1927, Vol. VIII, No. 4.) A reprint of this article will be sent on request.

Note: Magnets may be used on alternating current, in conjunction with a synchronous converter.

# Tips for Victor Giant Magnet

Cat. No. J6142	Cone Shaped Tip for Victor Giant Magnet	\$0.95	
Cat. No. J6143	2" Pointed Tip for Victor Giant Magnet		
Cat. No. J6144	2" Curved Tip for Victor Gian Magnet		

# Flexible Tip for Giant Magnet



This flexible tip (composed of tightly woven steel wires) may be moved freely through its holder until the operator can handle the small chuck with perfect freedom.

Some of the "pull" of the magnet is, of course, sacrificed, but even with the flexible tip extended to its farthest point the strength is far greater than with any of the small hand magnets.

In extracting magnetic particles that have actually penetrated the vitreous body, the full strength of the Giant

Magnet is required to attract and draw the metal particle forward. The flexible tip may be brought into play for the manipulation usually necessary before the particle can be withdrawn with safety.

The points supplied with this attachment are  $1\frac{1}{16}$ " long,  $\frac{5}{32}$ " diameter. Cat. No. J5388 Flexible Tip Attachment, with four nickel plated points.....\$24.00

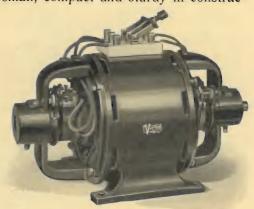
### Operating Victor Giant Magnet on Alternating Current

The Victor Synchronous Converter is small, compact and sturdy in construc-

tion and built to work with any Victor Giant Electromagnet of the same voltage.

It can be installed in an out-of-theway place and is always ready for use by simply closing a switch. Requires no more attention than any small motor.

Running in 110 volts alternating current, the Victor Synchronous Converter will deliver about 120 volts direct current, insuring ample energy for operation of magnets at full strength.



# Vibratory Massage Apparatus



"The principal uses of the Vibrator are for local stimulation, inhibition or sedation, massage and diagnosis. Stimulation is produced by a medium stroke and light pressure, the impulse being of a short duration, five to ten seconds; whereas for inhibition or sedative treatment the application is given with a heavier pressure and is prolonged from fifteen to twenty seconds even up to several minutes in certain conditions. For diagnosis, examination with the Vibrator better enables the physician to locate sensitive areas, particularly along the spine, and the various organs of the body, than by manual palpation, and suggests to the examiner conditions which might otherwise escape attention.

"Treatment by mechanical vibration has been found by clinical experience to be capable of:

- "(1) Increasing the volume of the blood and lymph flow to a given area or organ.
- "(2) Increasing nutrition.
- "(3) Improving the respiratory process and functions.
- "(4) Improving muscular and general metabolism, and increasing the production of animal heat.
- "(5) Stimulating the excretory organs and assisting the functions of elimination.
- "(6) Stimulating secretion.
- "(7) Softening and relieving muscular contractures.
- "(8) Relieving engorgement and congestion.
- "(9) Facilitating the removal through the natural channels of the lymphatics, of tumors, exudates and other products of inflammation.
- "(10) Inhibiting and relieving pain."

William J. Tindall, M. D.

#### VIBRATORY MASSAGE

Motor In the Victor vibrator the power is supplied by an extremely high speed electric motor which operates suitable mechanism for converting this power into vibratory waves.

The motor, whether direct or alternating, is capable of operating at high speed, and provided with speed controller by means of which the rate of

vibrations can be regulated.

Massage Handle The Victor massage handle has unquestionably the widest application of any massage implement on the market and fully meets every requirement in medical practice, due to the fact that the power of impact, as well as the frequency of vibrations, is under perfect control

From it can be obtained the percussion or hammer blow, the frictional or rubbing movement, and the true vibratory wave.

A means of adjustment is provided enabling the physician to obtain exactly the degree of vibration desired.

The applicators for localizing treatment can be attached to the handle so that they project either in a straight line with the handle or at right angles. In abdominal and general massage the handle may be used as shown in cut without any attachments.

Pedestal This pedestal is of metal throughout, finished in black enamel. It is equipped with a swivel top, with rubber covered fork for holding the massage handle.

Casters are the easy rolling, swivel type, making for greatest convenience in moving.

Lubrication is an important factor in keeping high speed mechanism of this character in smooth working order, a point that has been well looked after in the "Victor." What is perhaps of fully as much importance is that we have effectually confined the lubricating oil to the places requiring it, and as it is impossible for any of it to escape while the vibrator is in action, perfect cleanliness is insured.

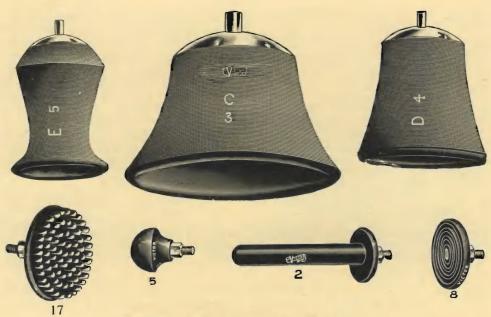
Summarizing The Victor Massage Outfit represents the highest perfection yet attained in apparatus of this type, and is the logical one for the physician—that he may realize the maximum results in every technique applying to vibratory massage.

Cat. No. J5252	Victor Massage Outfit, without pedestal, arranged for 110 volt	
	direct current. Incl. No. 1 Handle and 6 Applicators\$	175.00
Cat. No. 15253	Same as above, arranged for 220 volt direct current	179.00
Cat. No. 15254	Same as above, arranged for 110 volt, 60 cycle, alternating	
· ·	current. Incl. No. 1 Handle and 6 Applicators	178.00
Cat. No. 15255		
· ·	current. Incl. No. 1 Handle and 6 Applicators	182.00
Cat. No. 15867		
,	current. Incl. No. 1 Handle and 6 Applicators	188.00
Cat. No. 15868		
J		92.00
Cat. No. 15258	Victor No. 2 Pedestal for any of above outfits	35.00
	Victor No. 1 Massage Handle, with 6 applicators	70.00

(See illustrated list of massage applicators on next page)



Victor No. 1 Massage Handle



# Victor Massage Applicators

Cat. No. J5264	Soft Rubber Cone, extra large for abdominal and general application (C-3)	2.25
Cat. No. J5265	Soft Rubber Cone, with serrated or corrugated edge (D-4)	1.00
Cat. No. J5870	Soft Rubber Cone, facial application, especially around nose and eyes (E-5)	1.50
Cat. No. J5268	Straight Rectal Applicator, internal (2)	1.00
Cat. No. J5271	Hard Rubber Applicator, medium size, for muscular vibration (5)	1.25
Cat. No. J5274	Small Corrrugated Hard Rubber Disc (8)	1.00
Cat. No. J5283	Soft Rubber Brush (17)	.75

# Freer-Jackson Transilluminator

The source of light is a long, high candle power lamp, calculated to deliver a much greater volume of light than usually provided by miniature lamps. This is an advantage in examinations of the antrum and frontal sinus.

A clear glass shield permits of the transilluminator being placed for



a few moments in direct contact with the mucous surface, without danger of burning.

In order to adapt it for transocular illumination, an opaque glass shield is supplied.

Cat. No. J5390	With carbon lamp, 110 volt\$6.50
Cat. No. J5888	With tungsten lamp instead of carbon, 110 volt

### The Post Cautery

(For General Duty)



Post Cautery Outfit with Variety of Instruments

The energy control consists of a shielded resistor plug. Any of the instruments may be applied to this, so that in the event that the purchaser requires more than one instrument, all are readily interchangeable. The method of operation merely requires the insertion of the plug into an electric socket and applying the current. The heat is obtained by a slight pressure of the handle switch. Total length of cord wire is ten feet.

The standard Post Cautery operates on 110 volts, alternating or direct current. The same may be had for 220 or 32 volts upon request, no additional charge.



Illustrating Curved Knife Instrument No. 4

Note Convenient Sliding Sleeve Switch Easily Adjusted with Finger from Any Position of the Hand

The cautery point or knife is free from oxidation. The rugged heating element encased therein is fully insulated, as are also the connecting wires passing from the point through the handle. Current contact or shock to operator or patient is avoided. Allowing the cautery point or knife to reach maximum heat, a temperature of about 1400 deg. F. (cherry red) is arrived at, and the heat reserve of the element is amply sufficient to warrant a constant thermal flow that does not become cold when applied to tissue and may be retained for an hour continuously if necessary.

Each electrode is a complete unit with Bakelite insulated handle. Fitted on the handle is a sliding sleeve, positive contact switch, allowing the application

### CAUTERIES

of heat to the cautery knife by a slight pressure of finger, regardless of position of the hand. Current is released in the same manner, the handle being cool at all times, the switch left in fixed position if desired. There are several types of instruments to choose from, each one containing a permanent cautery knife or point of solid silver.

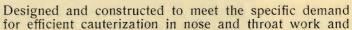
The outfit includes a leatherette case of sturdy construction, small enough for the handbag. Average weight about 2 lbs.

### Major Duty Instrument No. 6



For cancer, heavy hemmorhoidal and abdominal work with the Post Cautery. Triple heat capacity and reserve.

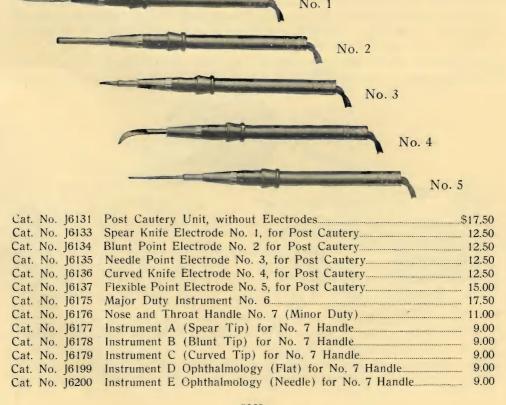
### Minor Duty Instrument No. 7



general light duty requiring deep penetration without searing of surrounding

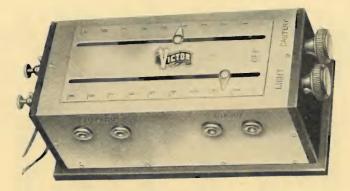
tissue.
Units A-B-C-D-E may be sterilized and are interchangeable on instrument No. 7. Easily adjusted to any fixed angle desired. Tip of Unit B is flexible.

Other Post Cautery Electrodes



# Cautery Transformer

(For A. C. Only)



Furnishes current for any ordinary cautery and illuminating all kinds of diagnostic lamps taking from  $1\frac{1}{2}$  to 12 volts. A slightly more expensive unit can be furnished for operating the heavy hemorrhoidal knives.

The price includes cord and plug to attach to ordinary lamp socket.

Size:  $7\frac{1}{4}x3\frac{1}{4}x2\frac{3}{8}$ "; weight, 4 lbs.

Unless otherwise specified, unit for 110 volts, 60 cycle, will be supplied.

Cat. No. J6244 Cautery Transformer ...

\$30.00

# Cautery Handles



Cat. No. J5431 Victor No. 2 Cautery Handle. A very serviceable handle, made of hard rubber with nickel plated, substantial set-screw terminals.....\$9.00



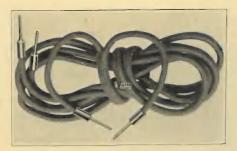
Cat. No. J6130 No. 4 Cautery Handle, small, for eye work

.\$3.50

# Cautery Cords

May be used with any of our handles.

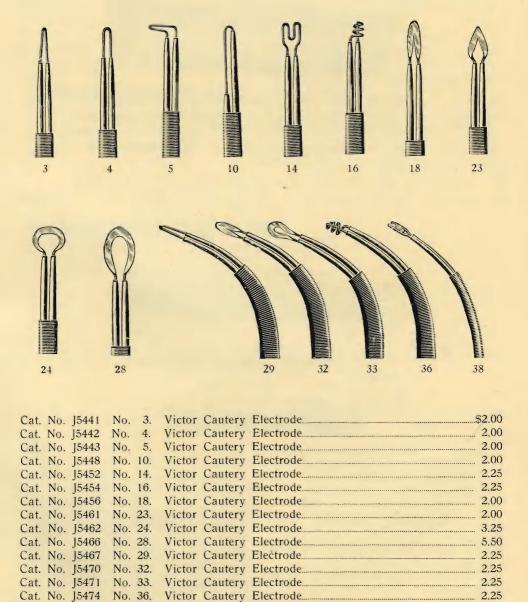
Cat. No. J5430 Per pair, with tips.....\$2.50



# Victor Iridio-Platinum Cautery Electrodes

All Victor cautery electrodes are made of iridio-platinum. This material has proved most efficient and most durable in years of actual practice.

Imitations made of various steel alloys are offered by many dealers at prices sometimes lower than our own. We believe that the surgeon who buys cautery electrodes from us is entitled to the protection of the "Victor" label, which guarantees the electrodes to be of iridio-platinum.



Cat. No. J5476 No. 38. Victor Cautery Electrode. 2.25

# VICTOR ELECTRIC CENTRIFUGES

Built to Serve

Physicians in Private Practice
Bacteriologists
Hospital Laboratories
Industrial Laboratories

3

Each Unit backed by a reputation of twenty years' faithful performance and serviced by a world-wide organization

# Victor No. 2 Centrifuge Equipment





For 110 volts, 60 cycle, A. C. or D. C. Add \$3.00 for 220 volt units. The following combination prices include a No. 2 Centrifuge with equipment described. See listing of Heads for rotating diameter at tip.

### COMBINATION "A"

2 Tube, 15 C. C. Head, with 2 graduated glass tubes, 2 aluminum tubes and trunnion rings—less dome.

2200 R. P. M.—D. C. 1800 R. P. M.—A. C. Price, Complete, \$84.05

### COMBINATION "B"

Like "A", except with dome.

3300 R. P. M.—D. C. 2800 R. P. M.—A. C. Price, Complete, \$96.05

### COMBINATION "C"

4 Tube, 15 C. C. Head, with 4 graduated glass tubes, 4 aluminum tubes and trunnion rings—less dome.

2200 R. P. M.—D. C. 1660 R. P. M.—A. C. Price, Complete, \$89.85

### COMBINATION "D"

Like "C", except with dome.

3300 R. P. M.—D. C. 2500 R. P. M.—A. C. Price, Complete, \$101.85

### COMBINATION "E"

2 Tube, 50 C. C. Head, with 2 bronze tubes and trunnion rings—less dome.

1800 R. P. M.—D. C. 1100 R. P. M.—A. C. Cannot be used with dome Price, Complete, \$89.65

### COMBINATION "F"

2 Tube, 50 C. C. Head, with 2 trunnion rings and cup for Babcock milk tubes—less dome.

1800 R. P. M.—D. C. 1100 R. P. M.—A. C. Cannot be used with dome Price, Complete, \$89.75

# Victor No. 2 Centrifuge

For the average laboratory this unit will be found both efficient and sufficient. Common urine analysis, miscellaneous chemical analyses and even Wassermann preparations may be handled with the No. 2 Centrifuge.

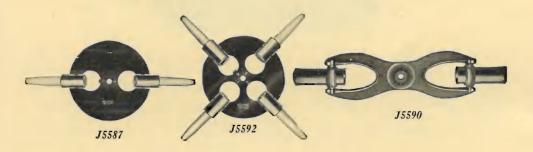
It is of rugged construction and will operate a 2 or 4 tube, 15 c. c. head or a 2 tube, 50 c. c. head. For larger capacities the No. 5 Centrifuge is recommended.

A controlling rheostat for changing the speed of the Centrifuge is readily accessible since it is mounted in the base.

DIMENSIONS: Weight,  $22\frac{1}{2}$  pounds; height over all, 15 inches; diameter over all, 10 inches; height over all, with dome in place, 20 inches; diameter over all, with dome in position,  $15\frac{1}{2}$  inches.

For lists of essential accessories, such as metal tubes, glassware, etc., to make up a working outfit, see below, also pages 100, 106 and 107.

Cat. No. J5567 Protective Dome (detachable) for Victor No. 2 Centrifuge, extra... 12.00



Cat. No. J5587 2-Tube, 15 c. c. Head for No. 2 Centrifuge, including J5580 trunnion rings only \_\_\_\_\_\_\_\_\$7.25

2 Tube, 15 c. c. Head shown with J5580 trunnion rings (permanently attached) and 15 c. c. aluminum tubes, J5577. Rotating diameter at tip of tube,  $33\frac{1}{2}$  c. m.

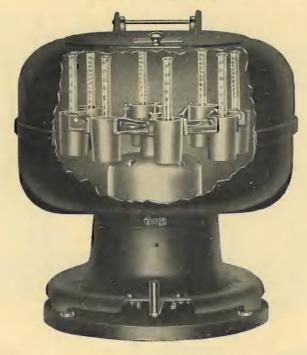
4 Tube, 15 c. c. Head shown with J5580 trunnion rings (permanently attached) and 15 c. c. aluminum tubes, J5577. Rotating diameter at tip of tube,  $33\frac{1}{2}$  c. m.

Cat. No. J5590 2-Tube, 50 c. c. Head for No. 2 Centrifuge, without trunnion rings or metal tubes \_\_\_\_\_\_\_\$10.25

2 Tube, 50 c. c. Head shown with J5579 trunnion rings and 50 c. c. bronze tubes, J5574. The Babcock trunnion cups are interchangeable with these trunnion rings. When "50 to 15" reducing bushings are used with the 50 c. c. bronze tubes the range of service is further increased. Rotating diameter at tip of tube: 50 c. c. tube, 41 c. m.; trunnion cup, 39 c. m.

NOTE—Head J5590 cannot be used with Protective Dome J5567

# Victor No. 5 Centrifuge Equipment Heavy Duty Types



For 110 volts, 60 cycle, A. C. or D. C. Add \$3.00 for 220 volt units. The following combination prices include a No. 5 Centrifuge with equipment as described. All No. 5 units are equipped with dome. See listing of heads for rotating diameter at tip of tube.

### COMBINATION "AA"

2 Tube, 15 C. C. Head, with 2 graduated glass tubes, 2 bronze tubes and trunnion rings.

4300 R. P. M.—D. C. 4100 R. P. M.—A. C. Price, Complete, \$190.25

### COMBINATION "BB"

Similar to "AA", except 4 tube setup.

4000 R. P. M.—D. C. 3700 R. P. M.—A. C. Price, Complete, \$199.75

### COMBINATION "CC"

Similar to "AA", except 8 tube setup.

3600 R. P. M.—D. C. 3400 R. P. M.—A. C. Price, Complete, \$209.50

### COMBINATION "DD"

2 Tube, 50 C. C. Head, with 2 bronze tubes and trunnion rings.

3600 R. P. M.—D. C. 3400 R. P. M.—A. C. Price, Complete, \$194.65

### COMBINATION "EE"

Similar to "DD", except 4 tube setup.

3600 R. P. M.—D. C. 3400 R. P. M.—A. C. Price, Complete, \$200.80

### COMBINATION "FF"

Similar to "DD", except 8 tube setup.

3400 R. P. M.—D. C. 3100 R. P. M.—A. C. Price, Complete, \$213.60

### CENTRIFUGES

COMBINATION "GG"
For Babcock Test Bottles
2 Tube, 50 C. C. Tube Head with trunnion cups and rings for Babcock bottles.

2000 R. P. M.—D. C. 2000 R. P. M.—A. C. Price, Complete, \$194.75

COMBINATION "HH" Similar to "GG", except 4 tube setup.

2000 R. P. M.—D. C. 2000 R. P. M.—A. C. Price, Complete, \$201.00

COMBINATION "II"

For Babcock Test Bottles

Similar to "GG", except 8 tube setup.

2000 R. P. M.—D. C. 2000 R. P. M.—A. C. Price, Complete, \$214.00

COMBINATION "JJ"
4 Tube Combination Head, 2 15 c. c. and 2 50 c. c. bronze tubes and trunnion rings, 2 15 c. c. graduated glass tubes.

3700 R. P. M.—D. C. 3600 R. P. M.—A. C. Price, Complete, \$198.40

### COMBINATION "KK"

Similar to "JJ", except 8 tube combination setup.

3500 R. P. M.—D. C. 3300 R. P. M.—A. C. Price, Complete, \$211.80

# COMBINATION "LL" Part of Head with Babcock Cups

4 Tube Combination Head, 2 15 c. c. bronze tubes and trunnion rings, 2 15 c. c. graduated glass tubes and 2 Babcock trunnion cups and rings for Babcock bottles.

2000 R. P. M.—D. C. 2000 R. P. M.—A. C. Price, Complete, \$198.50

### COMBINATION "MM"

Part of Head with Babcock Cups Similar to "JJ", except 8 tube combination setup.

> 2000 R. P. M.—D. C. 2000 R. P. M.—A. C. Price, Complete, \$212.00

### Victor No. 5 Centrifuge

This unit should be selected by laboratories handling very finely divided material and for institutions where speed is important. The Centrifugal force made available to the laboratory worker through the development of this machine gives him a means for speeding up his work and making separations that otherwise would be impossible.

The heavy construction gives a powerful machine that will function perfectly

under the most severe loads ordinarily encountered.

The protective dome is an integral part of the Centrifuge and the motor is entirely shut off from the Centrifuge chamber, thereby minimizing danger of possible combustion if highly inflammable solutions are used.

Large and accessible oil wells are provided and all heads are individually balanced which means quiet and consistent service for many years.

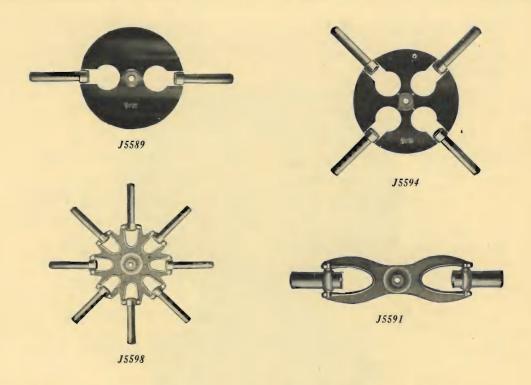
The "No. 5" is equipped with speed control so that the unit can be operated

at any of the speeds ordinarily used.

DIMENSIONS: Height over all, with cover closed,  $18\frac{1}{2}$  inches; height over all, with cover open,  $29\frac{1}{2}$  inches; diameter over all,  $18\frac{1}{2}$  inches; weight, 105 pounds.

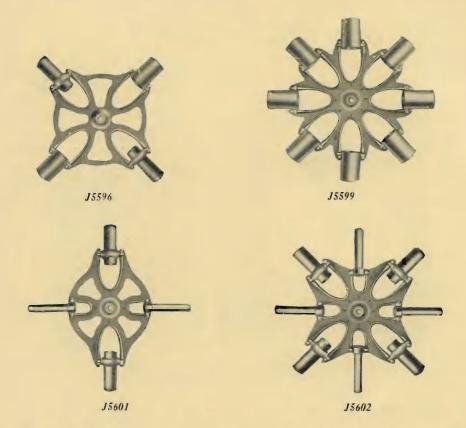
For lists of essential accessories, such as metal tubes, glassware, etc., to make up a working outfit, see pages 102 to 107, inclusive.

### CENTRIFUGES



Cat. No. J5589 2-Tube, 15 c. c. Head for Victor No. 5 Centrifuge, including permanently attached trunnion rings only \$7.75 2 Tube, 15 c. c. Head shown with J5578 trunnion rings (permanently attached) and 15 c. c. bronze tubes, J5573. Rotating diameter at tip of tube, 39 c. m.

Cat. No. J5598 8-Tube, 15 c. c. Head for Victor No. 5 Centrifuge, including permanently attached trunnion rings only......\$19.50 8 Tube, 15 c. c. Head shown with J5578 trunnion rings (permanently attached) and 15 c. c. bronze tubes, J5573. Rotating diameter at tip of tube, 39 c. m.



Cat. No. J5601 4-Tube Combination, 15 c. c. and 50 c. c. Head for Victor No. 5
Centrifuge, including only two 15 c. c. trunnion rings (permanently attached) \$11.50

4 Tube Combination, 15 c. c. and 50 c. c. Head shown with two J5578 trunnion rings (permanently attached) and two 15 c. c. bronze tubes, J5573; also two J5579 trunnion rings and two 50 c. c. bronze tubes, J5574. Babcock trunnion cups can be used in place of the two 50 c. c. bronze tubes, if desired. Again, if it is desired to centrifugate with four 15 c. c. glass tubes, two "50 to 15" reducing bushings can be inserted in the two 50 c. c. bronze tubes in order to accommodate the glass tubes of 15 c. c. capacity. Rotating diameter at tip of tube: 50 c. c. tube, 41 c. m.; trunnion cup, 39 c. m.; 15 c. c. tube, 39½ c. m.

Cat. No. J5602 8-Tube Combination, 15 c. c. and 50 c. c. Head for Victor No. 5
Centrifuge, including only four 15 c. c. trunnion rings (permanently attached) \$18.00

8 Tube Combination, 15 c. c. and 50 c. c. Head shown with four permanently attached 15 c. c. trunnion rings, J5578 and four 15 c. c. bronze tubes, J5573, also four J5579 trunnion rings and four 50 c. c. bronze tubes, J5574. Additional combinations suggest themselves with this head as mentioned with the above 4-Tube Combination Head. Same diameters as for J5601 head.

# Pertinent Accessories for Revolving Heads

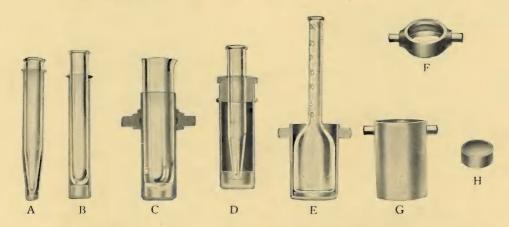


Diagram A—Shows 15 c. c. Aluminum Tube, J5577, with 15 c. c. plain glass tube, J5610, partially inserted. This aluminum tube will accommodate all 15 c. c. glassware excepting Hopkins Vaccine Tube and the round bottom tube, J5607. The aluminum tube is for use with No. 2 Centrifuge only.

Diagram B—Shows 15 c. c. Bronze Tube, J5573, with 15 c. c. plain round bottom glass tube, J5607, and rubber cushion, J5582, which is included in the price of the bronze tube. This bronze tube will accommodate all 15 c. c. glassware.

Diagram C—Shows 50 c. c. Bronze Tube, J5574, and trunnion ring, J5579, with 50 c. c. plain glass tube and rubber cushion, J5585, which is included in the price of the bronze tube.

Diagram D—Shows how the "50 to 15" Reducing Bushing, J5584, is adapted to the 50 c. c. bronze tube in order that the latter may be used also for 15 c. c. glassware.

Diagram E—Shows the Babcock Trunnion Cup, J5575, Rubber Cushion, J5586 (included in price of trunnion cup) and 30% Babcock Cream Test Bottle.

Figs. F. G. H.—Show the 50 c. c. Trunnion Ring, J5579, Babcock Trunnion Cup, J5575, and Rubber Cushion, J5585, respectively.

Cat.	No. J5577	15 c. c. Aluminum Tube, for use only on No. 2 Centrifuge	\$0.35
Cat.	No. J5573	15 c. c. Bronze Tube and J5582 Cushion.	.70
Cat.	No. J5574	50 c. c. Bronze Tube and J5585 Cushion	.90
Cat.	No. J5575	Babcock Trunnion Cup and J5586 Cushion	2.25
Cat.	No. J5584	"50 to 15" Reducing Bushing	.85
Cat.	No. J5579	Trunnion Ring for 50 c. c. Bronze Tubes	1.30
Cat.	No. J5578*	Trunnion Ring for 15 c. c. Metal Tubes on Heads for No. 5 Centrifuge only	
Cat.	No. J5580*	Trunnion Ring for 15 c. c. Metal Tubes on Heads for No. 2 Centrifuge only	.50
Cat.	No. J5582	Extra Rubber Cushions for No. J5573—Bronze Tube, 15 c. c	1.10
Cat.	No. J5585	Extra Rubber Cushions for No. J5574—Bronze Tube, 50 c. c.	1.90
Cat.	No. J5586	Extra Rubber Cushions for Babcock Trunnion Cup	1.90

<sup>\*</sup>The 15 c. c. trunnion rings are always included in the price of "15 c. c." and "combination" heads, and are listed separately only for convenience in ordering extra parts.

### CENTRIFUGES

# Centrifuge Glassware



J5607 15 c. c. Plain Round Bottom.



J5610 15 c. c. Plain Conical.



J5613 15 c. c. Graduated Conical.

Cat. No. J5607	Plain Glass Tube, 15 c. c. round bottom, each	.\$0,10
Cat. No. J5608	Plain Glass Tube, 15 c. c. round bottom, dozen lots	1.20
Cat. No. J5609	Plain Glass Tube, 15 c. c. round bottom, ½ gross lots	4.50
Cat. No. J5610	Plain Glass Tube, 15 c. c. conical bottom, used only with J5577 Aluminum Tube, each	
Cat. No. J5611	Plain Glass Tube, 15 c. c. conical bottom, used only with J5577 Aluminum Tube, dozen lots	
Cat. No. J5612	Plain Glass Tube, 15 c. c. conical bottom, used only with J5577 Aluminum Tube, ½ gross lots	
Cat. No. J5613	Graduated Glass Tube, 15 c. c. with conical bottom, each	55
Cat. No. J5614	Graduated Glass Tube, 15 c. c. with conical bottom, ½ dozen lots	2.65

### Claritor

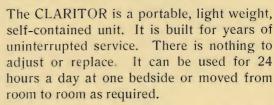
The CLARITOR absorbs all offensive odors as quickly as they arise, right at the source. It is really indispensable in the handling of such cases as gangrene, cancer, burns, colostomy, urological diseases, etc., and also in connection with the bed pan and also in colon lavage cases.

The CLARITOR is used in hospital wards, private rooms, or home of patient afflicted with diseases that produce offensive odors.



The CLARITOR is easy to use. It is simply hooked on to the frame of the bed—the rubber tube is placed under the bed clothes and the electric cord attached to any convenient outlet. Instantly a stream of odor-laden air is gently drawn into the tube by an electric motor fan and passed through a

charcoal filter, which clarifies it and releases clean, odorless air into the room.

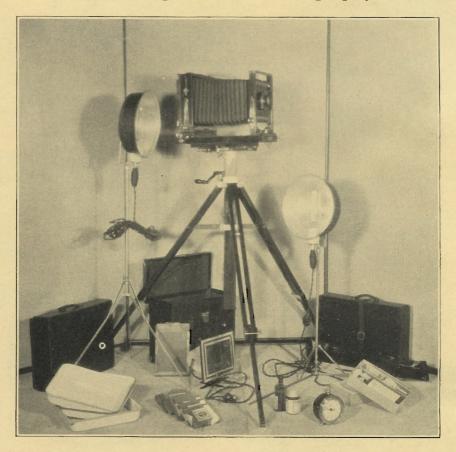


Claritors are supplied at the regular price for 110 volt A. C., 60 cycle and 110 volt D. C. Prices on other voltages, etc., quoted on request.

Size—height, 12"; diameter,  $5\frac{1}{2}$ "; weight, 12 lbs. Shipping weight, 21 lbs.



# Victor-Agfa Color Photography



With Victor-Agfa color plates one can make photographs in natural colors by a process quite as simple as that of amateur photography. Any one of these polychromatic plates will reproduce every color in the subject with perfect accuracy.

The Ansco camera—recommended for this work, is the usual 5x7 rear vision type equipped with a F-4.5 lens. The same as used for making ordinary black and white negatives. Photographic reductions of radiographs are made with this camera for the purpose of copying negatives either to reduce the forma or to transfer from nitrate film to acetate.

### Complete list of equipment and accessories for Natural Color Photography:

Cat. No. A3948	1 Victor-Ansco Camera, including F-4.5 Wollensak Lens, Tripod and Plate Holder\$	148 50
Cat. No. A3210	Developing Tray, 5"x7" (3 required)ea.	1.10
Cat. No. A3949	1 Luminum Dark Room and Viewing Light (with filter for	
	color plate work)	22.30
Cat. No. A3950	1 Ansco Timer (fract. sec.)	5.00
Cat. No. A3951	Victor-Agfa Color Plates, 31/4"x4" (box of 4)	1.44
Cat. No. A3952	Victor-Agfa Developing Set (chemicals for color plates)	1.75
Cat. No. A3953	1 Bottle Victor-Agfa Reducer (for color plates)	.70
Cat. No. A3954	1 Bottle Victor-Agfa Intensifier (for color plates)	.60
Cat. No. A3955	Victor Floodlight with bulb for 115 volts (2 required)	21.50
Cat. No. A3956	1 Projector, Model B Balopticon with 500-Watt, 115 volt Mazda	
	lamp, with ground and polished glass reflector; 15 feet of	
	extension cord with connecting plug and switch; double slide	
	carrier; metal carrying case; and 15/8" diameter, 6" focus	
	projection lens in spiral focusing mount.	57.00
Cot No A2057	E 45 Wellowed Long	
Cat. No. A3957	F-4.5 Wollensak Lens	58.50



### Victor Cardiofilm

Victor Cardiofilm tells the story of the heart's condition in clear cut detail. It has an emulsion best suited for Victor Electrocardiograph cameras. Applied on a base of singular transparency, free from color tinge.

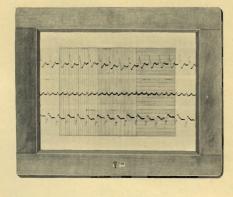
Cat. No. A3804 Victor Nitrate Cardiofilm. Prices on Cat. No. A3925 Victor Non-Flam Cardiofilm. Application

### Cardiomounts

These mounts are made of two thicknesses of cardboard. The upper card has indexed slots mounted over abscissa rulings, printed in red on the undercard. The cardiogram is slipped between the cards for examination, diagnosis and filing.

Letterhead Size (8½x11)

Cat. No. A3812 Victor Cardiomounts, per 100 \$10.00 \$10.00 \$50 \$45.00 \$1000 \$85.00





# Cardioprinter

With this printing frame you can reproduce on bromide paper  $6\frac{1}{2}x8\frac{1}{2}$  duplicates of electrocardiograms superimposed on abscissa and ordinate rulings.

Cat. No. A3894 Victor Cardioprinter.....\$7.50

# Electrocardiography—Books

Cat. No. J6241	Willius—Clinical Electrocardiograms; their Interpretation and Significance \$8.00
	Typical records of cardiac disorders and transitional changes.  Interpretation discussed. No technic given on subject.
Cat. No. 16245	
Cat. No. J6246	Pardee—Clinical Aspect of the Electrocardiogram 5.50
	Good general reference. Interpretation and machine operation.
Cat. No. J6248	Parsonnet and Hyman—Applied Electrocardiography
	For the education of the practitioner in the art of interpreting
	the clinical features of his case. Contains original records of
	every known irregularity explained in detail so that physician may use them for the interpretation of his own records.
	may use them for the interpretation of his own records.

# The Line

### Medical

### X-Ray Apparatus

From the small outfits for Physicians' offices up to the specialized equipment as used in the hospital for complete diagnostic and deep therapy work.

### Dental

"CDX"—the 100% electrically safe dental X-ray unit of modest dimensions.

Coolidge X-Ray Tubes

### Supplies

Films, Cassettes, Screens, Protective Materials, Dark Room Materials, Diagnostic Opaques, Tanks, Dental Films, Film Filing Cabinets, etc.

# Physical Therapy Apparatus and Electro-Medical Specialties

High Frequency Apparatus

Medical Diathermy Surgical Diathermy

Wave Generators

Sinusoidal—Galvanic

Muscle Training Apparatus

Vibratory Massage Apparatus

Treatment Tables

"Giant" Eye Magnet

Cautery Units

Supplies

Ultraviolet Quartz Lamps
Air-Cooled—Water-Cooled

Radiant Heat Lamps

Incandescent

Infra-red

Hydrotherapy Equipment

Electric Heat Pads

Bakers

Infant Incubators

Transilluminators

Electric Centrifuges

A complete line of physical therapeutic supplies, including Diathermy, Galvanic and Sinusoidal Electrodes, Quartz Applicators for Ultraviolet Therapy, etc.

### Electrocardiograph

The Victor instrument amplifies the body current by a method similar to radio amplification, thereby combining compactness and sturdiness in design with an exceptionally high degree of sensitiveness.



